ASX Announcement

5 September 2025

Works Approval for Arrowsmith North Silica Sand Project

Highlights:

- **DWER grants Part V works approval for 100%-owned Arrowsmith North Silica Sand Project**
- **Follows recent grant of environmental and mining approvals for Arrowsmith North**
- **Arrowsmith North is a globally significant, high-quality and long-life silica sand project for foundry, container glass and flat-glass markets in Asia**

VRX Silica Limited (**VRX** or **Company**) is pleased to announce it has received works approval from the Department of Water and Environmental Regulation (**DWER**) for the proposed development of its 100%-owned Arrowsmith North Silica Sand Project (**Arrowsmith North**).

This follows environmental approval from the Minister for the Environment under Part IV of the Environmental Protection Act 1986 (**EP Act**) [1] and the approval for the mining proposal from the Department of Mining, Petroleum and Energy in August 2025.[2]

Works approval allows for the development of Arrowsmith North, in particular construction and operation of the processing plant and associated infrastructure. The EP Act requires a works approval to be obtained before constructing a prescribed premises and makes it an offence to cause an emission or discharge unless a licence or registration is held for those premises.

As is customary, the works approval for Arrowsmith North comes with specific conditions to manage environmental impacts. The conditions attached to the approval have been previously accepted by VRX and align with VRX's commitment to safe, sustainable and responsible operations at Arrowsmith North.

[1] ASX announcement "Environmental Approval for Arrowsmith North Silica Sand Project" dated 2 September 2025.
[2] ASX announcement "DMPE Approves Mining Proposal for Arrowsmith North Silica Sand Project" dated 8 August 2025.

ASX: VRX

Capital Structure

Shares on Issue: 747 million

Options on issue: 34.2 million

Corporate Directory

Paul Boyatzis
Non-Executive Chairman

Bruce Maluish
Managing Director

Peter Pawlowitsch
Non-Executive Director

David Welch
Non-Executive Director

Ian Hobson
Company Secretary

Silica Sand Projects

Arrowsmith *Silica Sand Projects, 270km north of Perth, WA.*

Muchea *Silica Sand Project, 50km north of Perth, WA.*

Boyatup *Silica Sand Project, 100km east of Esperance, WA.*

Geothermal Energy

Dandaragan *Geothermal Energy Permit, 145km north of Perth, WA*

The Company is actively assessing other silica sand and downstream processing projects in Australia.

VRX Silica Limited
A Ground Floor 52 Kings Park Road, West Perth 6005 • PO Box 1925, West Perth WA 6872 Australia • ABN 59 142 014 873
P +61 8 9226 3780 • E info@vrxsilica.com.au • W vrxsilica.com.au

Arrowsmith North, 270km north of Perth, contains a globally significant deposit of high-quality silica sand underpinning a mining project that will enable long term production for the foundry, container glass and flat-glass markets in Asia. As detailed in the updated bankable feasibility study announced to ASX in March 2024, Arrowsmith North has a JORC-compliant Proved and Probable Ore Reserve of 221Mt @ 99.5% SiO_2 and VRX is proposing for Arrowsmith North to ramp-up from approx. 1Mtpa to produce more than 2Mtpa of silica sand for decades.[3] Extensive product testing by prospective customers has confirmed the attractiveness of Arrowsmith North silica sand.

Bruce Maluish, VRX Managing Director, said, "*We are pleased to have received works approval for Arrowsmith North so soon after receiving State environmental approval. This is yet another significant milestone for VRX and the development of Arrowsmith North as we move towards production.*"

Globally, the silica sand market is experiencing strong growth, driven by rising demand in the construction sector — particularly for flat glass used in windows — and for automobile glass in Asia's growing automotive industry. The foundry market is also experiencing strong growth, driven by increasing demand in established markets in South Korea, Japan and China and emerging markets in Thailand and India amid an industry wide expansion and diminishing supplies across Asia.

Australia is currently the largest exporter of silica sand in the Asia-Pacific region. Exports are dominated by multi-national groups with exports last year exceeding 3.3 million tonnes.

VRX remains focussed on obtaining remaining approvals and permits, finalising binding offtake agreements, project infrastructure agreements including logistics and transport, mining services, power supply and construction contracts and project finance. First production is targeted for H2 2026 with discussions on all fronts being advanced.

Arrowsmith North has the potential to support a new, long-term industry in Western Australia's Mid West region and deliver benefits including long-term direct and indirect employment and royalties. VRX has considerable support from a range of stakeholders, including local Indigenous groups, local shires, the Mid West Development Commission, the Mid West Chamber of Commerce & Industry and State and Federal Governments.

This announcement has been approved for release by the Managing Director.

Further information:

Bruce Maluish
Managing Director
brucem@vrxsilica.com.au
08 9226 3780

Peter Klinger
Purple
pklinger@purple.au
0411 251 540

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VRX Silica Limited, Ground floor, 52 Kings Park Rd
WEST PERTH WA 6005

[3] Updated bankable feasibility study released to ASX (ASX announcement "Arrowsmith North Updated BFS" dated 6 March 2024). See also Resource and Reserve table and Compliance Statement in the appendix to this announcement.

About VRX's target silica sand markets

Glassmaking

Silica sand is the primary component of all types of standard and specialty glass. It provides the essential SiO_2 component of glass formulation and its chemical purity is the primary determinant of colour, clarity and strength in glass. Silica sand is used to produce flat glass for building and automotive use, container glass for foods and beverages, and tableware. In its pulverised form, ground silica is required in the production of fibreglass insulation and for reinforcing glass fibres. Specialty glass applications include test tubes and other scientific tools, incandescent and fluorescent lamps, television and computer LCD/LED monitors. Glassmaking physical specifications focus on particle size, as it significantly impacts melting efficiency. Uniform grain size is preferred to reduce energy use and ensure complete melting. In fibreglass production, over 99.5% of raw material grains are smaller than 0.045 mm (45µm), and tighter limits are being considered. Coarse particles are hardest to melt and can cause defects. Grain shape also matters—if too many grains are coarser than specified, incomplete melting and poor product quality can result.

Refractory heavy minerals (RHM)—such as iron, zircon, corundum, chrome spinels, rutile, and staurolite—should generally be avoided in glassmaking because they do not melt at standard glass-making temperatures. This leads to solid inclusions or defects ("stones") in the final glass. Limits on RHM are typically based on their size and amount, with particles larger than 0.25 mm (10 mesh) being the most problematic. These may be restricted by weight percentage or particle count.

Foundry

Silica sand is an essential part of both the ferrous and non-ferrous foundry industries. Metal parts ranging from engine blocks to sink faucets are cast in a sand-and-clay mould to produce their external shape, often using a resin coat to create the desired internal shape. Silica's high fusion point (1,760°C) and low rate of thermal expansion produce stable cores and moulds compatible with all pouring temperatures. Its chemical purity also helps prevent interaction with catalysts or affecting the curing rate of chemical binders, for that reason, customers are looking for high quality silica sand that meets their specifications for size and shape.

Another critical specification is the hardness of silica grains to deliver the required crush resistance to high pressure from molten metals.

Arrowsmith North is capable of producing multiple high quality sand products for the foundry industry as confirmed by potential offtake partners in Asia following extensive testwork.

About VRX Silica Limited

VRX Silica Limited (ASX: VRX) is the most advanced pure-play silica sand company listed on the ASX, developing its 100% owned silica sand projects at Arrowsmith (North, Brand and Central), Muchea and Boyatup in Western Australia.

Silica sand is the most used commodity on the planet after air and water. It is the main ingredient in all types of glassmaking, including specialty solar panel and high-tech glass and foundry casting. It is a finite resource that is running out, with the Asia-Pacific region experiencing an ever-growing supply shortfall that is driving up prices.

Arrowsmith is located 270km north of Perth. Arrowsmith North boasts a minimum 25-year mine life capable of producing more than 2Mt tonnes per year of high-grade (99.7% SiO_2)* silica sand for export to the foundry, container glass and flat glass markets in Asia, with permitting well advanced, and will lead production.

Muchea, located 50km north of Perth, is an ultra-high-grade (99.9% SiO_2)* silica sand project capable of producing sand required for ultra-clear glass for solar panels and other high-tech glass applications.

Boyatup, located 100km east of Esperance, is under development and capable of producing sand for the glass market.

*Information relating to grades are extracted from releases to ASX on 28 August 2019, 11 November 2022 and 6 March 2024 (Arrowsmith North) and 18 October 2019 (Muchea). The company is not aware of any new information or data that materially affects this information.

Appendix

Arrowsmith North Ore Reserves and Grades

Project	Classification	Product	Mt	SiO_2 %	Al_2O_3 %	Fe_2O_3 %	TiO_2 %	LOI %
Arrowsmith North	Proved	AFS20	0.8	99.5	0.25	0.07	0.05	0.1
		AFS35	3.9	99.5	0.5	0.06	0.05	0.1
		AFS55	2.7	99.2	0.5	0.1	0.05	0.1
		Local	1.8					
	Proved Ore Reserve		**9.2**	**Million Tonnes**				
	Probable	AFS20	24.2	99.5	0.25	0.07	0.05	0.1
		AFS35	102.5	99.5	0.5	0.06	0.05	0.1
		AFS55	51.1	99.2	0.5	0.1	0.05	0.1
		Local	34.1					
	Probable Ore Reserve		**212**	**Million Tonnes**				
Total Ore Reserves			**259**	**Million Tonnes**				

Compliance Statement – Ore Reserves and Grades

The information in this document that relates to the estimation and reporting of the Ore Reserves for the Arrowsmith North silica sand project is extracted from releases to ASX on 28 August 2019, 11 November 2022 and 6 March 2024. The Company confirms that it is not aware of any new information or data that materially affects the information included in this document and all material assumptions and technical parameters underpinning the estimates in those releases continue to apply and have not materially changed.

Compliance Statement – Production Target

The information in this document that relates to the Company's production target for the Arrowsmith North silica sand project is extracted from releases to ASX on 6 March 2024. The Company confirms that it is not aware of any new information or data that materially affects the information included in this document and all material assumptions underpinning the production target continue to apply and have not materially changed.

The Company also confirms that the form and context in which the Competent Person's findings are presented have not been materially modified from the relevant original market announcements.