

# South Australia's Copper Strategy

Consultation paper

## Public Consultation: The South Australian Copper Strategy refresh

Have your say on how South Australia can realise the full potential of its vast copper resources and provide the raw materials needed to support the global green energy transition.

### What's being decided?

The Department for Energy and Mining (DEM) is seeking your feedback as we develop a refreshed South Australian Copper Strategy. The strategy seeks your input on the key themes, targets, projects and actions which will create the most value to South Australians from the state's copper resources.

Through the strategy development process we aim to:

- set the South Australian ambition for copper production, exploration and shared benefits
- establish performance success targets for the sector across a range of outcomes including production, investment, and environment, social and governance (ESG) objectives
- position the state to support sustained growth in production from our planned and existing mines
- integrate the copper strategy with broader state priorities and major projects such as the State Prosperity Project and Northern Water project
- identify opportunities to accelerate or support copper exploration and further resource identification
- identify new or innovative opportunities to capture additional value from the growth in the copper sector within our state.

### Context

South Australia's substantial copper resources have created incredible opportunities for the state throughout a proud history of discovery, production and sale.

Currently, copper is South Australia's number one export by value and the state continues to realise a wide range of benefits from this resource in many parts of the economy.

As global demand for copper enters a period of sustained growth, driven largely by the green energy transition, South Australian copper will play a pivotal role in providing the necessary raw materials.

Towards 2030 and beyond, there will be significant and sustained growth in South Australian copper production. South Australia needs a copper strategy that can support this level of growth, identify new opportunities for the future, and realise the full potential of benefits from this resource for all South Australians.

## Background

Australia has the world's third-largest copper reserves after Chile and Peru, accounting for more than a 10% share of global copper reserves. Within that national context, South Australia accounts for more than 69% of Australia's demonstrated economic reserves of copper and is home to several copper mines including Olympic Dam, which is Australia's largest.

To support copper industry development, the South Australian government released the first Copper Strategy in 2016. This strategy sought to triple production of copper to one million tonnes per annum by 2030.

Since 2016, South Australia has recorded significant achievements including new discoveries, new mines and new investment. Underpinned by the inaugural Copper Strategy and previous initiatives, production has increased from 250,000 tonnes in 2014–15 to over 320,000 tonnes in 2023–24. However, there is still progress to be made to realise the former Copper Strategy's ambition of one million tonnes of copper production per year.

## The need for a copper strategy

Global demand for copper is expected to double over the next 30 years. Copper demand is rising because of its importance to the green energy transition that can help realise the goal of net zero carbon emissions by 2050.

However, supply is being challenged worldwide by lower copper ore grades and fewer, significant new copper discoveries. This issue is exacerbated by long and increasing lead times between discovery and production.

While South Australia is already a world-leading copper producer, there is a clear opportunity to dramatically elevate the state's standing in the global copper supply chain. The major copper producer in our state – BHP – proposes to increase smelter and refinery production capacity at Olympic Dam, **adding** more than 300,000 tonnes of additional refined copper in the 2030s. A refreshed copper strategy is needed to realise the full potential of this growth.

### **We want to hear from you – Part 1: Setting our copper ambitions.**

*What is most important to you for the future of copper in South Australia?*

*What is the role for federal, state and local governments in supporting the expansion of the copper sector?*

*What projects or activities can be undertaken by government, industry or research bodies (or partnerships between them) to unlock the greatest value from the state's copper resources?*

*What are the barriers or issues we need to consider that may affect our ability to support significant growth?*

## **Emerging themes**

The refreshed copper strategy will identify key policy, investment and engagement opportunities which can deliver the outcomes necessary to support the state's future copper ambitions. The strategy will contain actions and projects which can be taken by a range of stakeholders including government, industry and research bodies.

Early engagement is underway to hear from key stakeholders and their ambitions for the state's future copper sector. As a result of these discussions, four key themes have emerged which will serve as the framework for actions and projects to be developed as part of the refreshed strategy.

DEM will continue to work with other state and federal government agencies, members of industry, research bodies, and communities to identify the projects within each theme listed below to deliver the strategy objectives.

### **Theme 1: Maximising exploration and new mine development**

*Accelerating the discovery and development of new copper resources by small and mid-sized companies.*

Part of this theme will develop and assess projects to improve the speed and success rate achieved by companies moving through the stages of copper project development. Actions will target development phases from precompetitive data collection and use, through to commencing commercial operations.

This theme focuses on accelerating key stages in the project development pipeline, attracting established mid-sized entities currently not operating in South Australia. It also aims to identify opportunities to connect junior explorers with sources of finance at critical investment stages.

## Theme 2: Leveraging our precompetitive data strengths

*Enhancing the existing framework to implement and use South Australia's strong and highly regarded precompetitive data created and managed by the Geological Survey of South Australia.*

The focus of this theme will be on future opportunities our Geological Survey of South Australia (GSSA) will pursue, to foster competitive attraction of exploration investment in South Australia's copper resource.

This theme also encompasses assessing projects to identify which prospective areas within the state are preferable to develop, based on existing or planned infrastructure. It will match this assessment data with existing copper prospectivity information to de-risk further investment and exploration in these areas.

## Theme 3: Positioning South Australia to support increased copper production

*Positioning the state to support significant and sustained production growth in planned and existing mines.*

Part of this theme seeks to develop and assess projects to enhance South Australia's broader copper sector so that it is capable of supporting the major expansions of existing operations and planned new mines.

Projects in this theme could involve developing or supporting auxiliary industries such as service and technology providers. They could also involve programs to maximise workforce development, enhance local research programs and potential revisions to key legislation.

## Theme 4: Realising maximum benefits within South Australia

*Establishing the conditions necessary to capture the maximum potential benefits within the state from broader global demand for copper.* Part of this theme will assess potential initiatives linked to manufacturing opportunities focused on copper products, identification of green copper certifications and incentives, assessment of the full lifecycle of copper-derived renewable infrastructure and potential for local recycling programs.

## **We want to hear from you – Part 2: Areas of opportunity.**

*What focus areas or themes are most important to you?*

*South Australia's GSSA has run highly successful programs of work including the Plan for Accelerating Exploration (PACE) Copper and the Accelerated Discovery Initiative (ADI). What future GSSA programs would deliver the most value to South Australia's copper exploration activities?*

*What are the biggest barriers or issues to developing already known copper resources?*

*What opportunities are there to add value to South Australian copper before it is exported or recycled?*

*The mine of the future may look substantially different to mines of today. What are the biggest changes you anticipate and how can South Australia be ready for these changes?*

## **Enablers**

South Australia boasts world-scale copper deposits and mineral potential. However, simply having the resources available doesn't guarantee long-term success. Development of each opportunity is only enabled when all the necessary project ingredients are available and accessible.

South Australia boasts many of these already, including a globally recognised geological database, modern regulatory frameworks and vast raw resources. However, developing new mines and expanding existing mines need economically sustainable access to water, energy, transport and export infrastructure to realise their full potential.

### **Infrastructure corridors**

Shared land corridors for the provision of necessary infrastructure can bring cost savings and reduced timelines for project approvals. The South Australian government is considering an approach for multiple proponents to use common corridors for shared infrastructure such as water, energy, road, rail and telecommunications.

### **Water**

The South Australian government's Northern Water project aims to enable the growth of the broader mining and mineral processing sector in the north of the state and the hydrogen industry in the Upper Spencer Gulf. The project involves the

development of a major desalination plant and pipelines, producing up to 260 megalitres per day of water.

This volume of additional and sustainable water supply also provides secure water for regional communities such as Roxby Downs. Without a new water supply reducing reliance on the River Murray and Great Artesian Basin, opportunities for growth in mining and minerals processing may be constrained.

## Energy

South Australia has set a net 100% renewable electricity generation target by 2027. The *Hydrogen and Renewable Energy Act 2023* provides a framework for the responsible development of large-scale renewable energy and hydrogen projects in the state, to support further industrial growth.

The first two proposed release areas for large scale renewable energy developments have been issued for public consultation. South Australia's clean energy expansion will further support green copper production and processing.

## Regulatory frameworks

South Australia has introduced nation-leading 'one window to government' licencing and regulatory systems.

The *Hydrogen and Renewable Energy Act 2023* embodies this concept by providing a centralised framework for individuals to access and understand their rights and guiding them through government services and resources.

Other key recent regulatory reform developments in South Australia include modernising the *Mining Act 1971* and *Energy Resources Act 2000*, and the delivery of the *Hydrogen and Renewable Energy Act 2023*, providing a framework for consultation and ensuring sharing of benefits with all South Australians including First Nations communities.

Nationally, the Australian government is developing community benefit principles that focus on jobs, workforce participation, community engagement and benefit sharing, strengthening local industry capabilities and enhanced transparency – to guide significant government investment decisions under the *Future Made in Australia – National Interest Framework*.

### **We want to hear from you – Part 3: Critical enablers.**

*Copper mine developments require a range of infrastructure to be available, often requiring significant upfront investment. What is the role of government to lower these initial costs?*

*How can we make it easier to develop existing copper resources in South Australia (for example infrastructure corridors, workforce development, project assessment processes)?*

*What additional changes to new and existing regulatory frameworks could provide greater opportunity to develop the copper resources in South Australia and grow the copper industry?*

*How can we establish and cultivate productive relationships, and benefit sharing between landholders, local and First Nations communities, explorers and producers?*

## **Measuring success**

In the last 12 months to August 2024, the export value of refined copper and copper products exceeded \$2.6 billion. This makes copper South Australia's most valuable export commodity. Copper production creates significant direct economic benefit to the state, often realised as royalties. Royalties from copper production contributes around one-third of the state's annual royalty revenue.

However, benefits of the copper sector are much broader than pure monetary value. Local suppliers, regional communities and thousands of ongoing jobs are supported by the copper industry.

There is no simple way to measure the complete performance of an entire industry, however the early work undertaken to establish the current industry baseline has identified the following selected metrics:

- Total copper production (measured in tonnes produced per year)
- Cost of production (the cost to produce each tonne of copper)
- Total contribution to Gross State Product
- Total contribution to regional communities and infrastructure
- Procurement total value (measured as local supplier spend within South Australia)
- Total number of companies actively exploring in South Australia
- Carbon emissions intensity per tonne of copper produced
- Capital investment in new mines and mine expansions
- Share of the global copper supply market

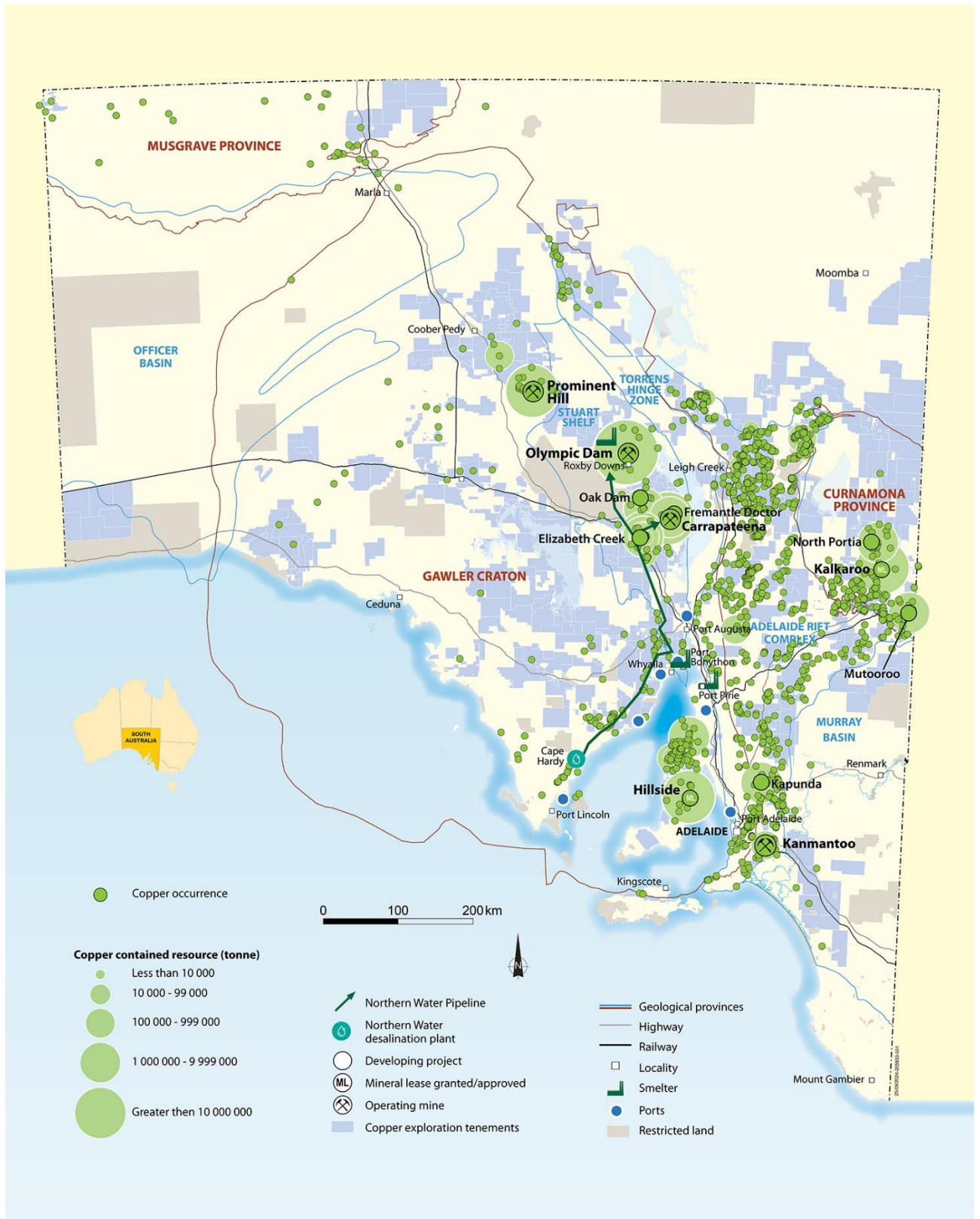
**We want to hear from you – Part 4: Measuring success.**

*How do you think we should measure the success of South Australia's copper sector?  
What is missing from the list of selected metrics above?*

*What community benefits would you like to see delivered as part of the new copper strategy? What is most important to you?*

- *Jobs that are safe, secure and have good conditions*
- *Workforce and skills development*
- *Opportunities to broaden workforce participation, including for example addressing workplace diversity*
- *Collaborative engagement, investment and benefit sharing with local and First Nations communities*
- *Stronger local supply chains*
- *Improved transparency and compliance with regulations and any government support*
- *Other?*

Map of copper resources in South Australia



### Acknowledgement of Country

The Department for Energy and Mining acknowledges Aboriginal people as the First Nations peoples of South Australia. We recognise and respect their cultural connections as the traditional owners and occupants of the land and waters of South Australia, and that they continue to make a unique and irreplaceable contribution to the state.

## FURTHER INFORMATION

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