

THE COOK ISLANDS SEABED MINERALS JOURNEY





KIA ORANA FROM THE HONOURABLE PRIME MINISTER MARK BROWN

As Chair and host of the 52nd Pacific Islands Forum Leaders Meeting, it is my honour to extend once again a warm Kia Orana to all my fellow Pacific Leaders and your delegations, and all our friends of Te Moana Nui a Kiva – our Blue Pacific Continent.

Te Moana Nui a Kiva is our home. It is our oceans, our lands, our common heritage, and our Pacific people. Our ancestors skilfully navigated the vast and uncharted oceans on the double-hulled vaka, drawing upon ancient wisdom. The vaka symbolises our Pacific spirit of voyaging and curiosity. It embodies our tenacity and resilience as an oceanic people.

Today, we, too, prepare our vaka to venture beyond the horizon, this time exploring and discovering our deep sea in the Cook Islands. Guided by our deep respect for our environment and driven by a forward-looking vision, our mission is clear: the responsible and sustainable development of our seabed minerals.

With the hopes of our people held close to heart and the promise of generational prosperity in mind, we are on an extraordinary journey of growth and discovery. This endeavour was initially perceived as a bold and pioneering step, nurturing an industry still in its infancy globally. However, the undeniable potential it harbours also carries with it a profound responsibility that we do not take lightly, nor shy away from as stewards of our Te Moana Nui a Kiva.

DISCOVERY OF SEABED MINERALS IN THE COOK ISLANDS

Exploration for seabed minerals (**SBM**) within the Cook Islands EEZ was first carried out in the 1960s by research vessels from the US and USSR. They discovered that the seabed is enriched in spherical concretions of minerals – known as polymetallic nodules.

Further exploration undertaken in the 1970s through to the early 2000s identified significant seabed minerals resources throughout the Pacific region.

The Cook Islands nodule resource is world-class, estimated at 6.7 billion tonnes, and containing minerals such as manganese, cobalt, nickel, copper and rare-earth elements.

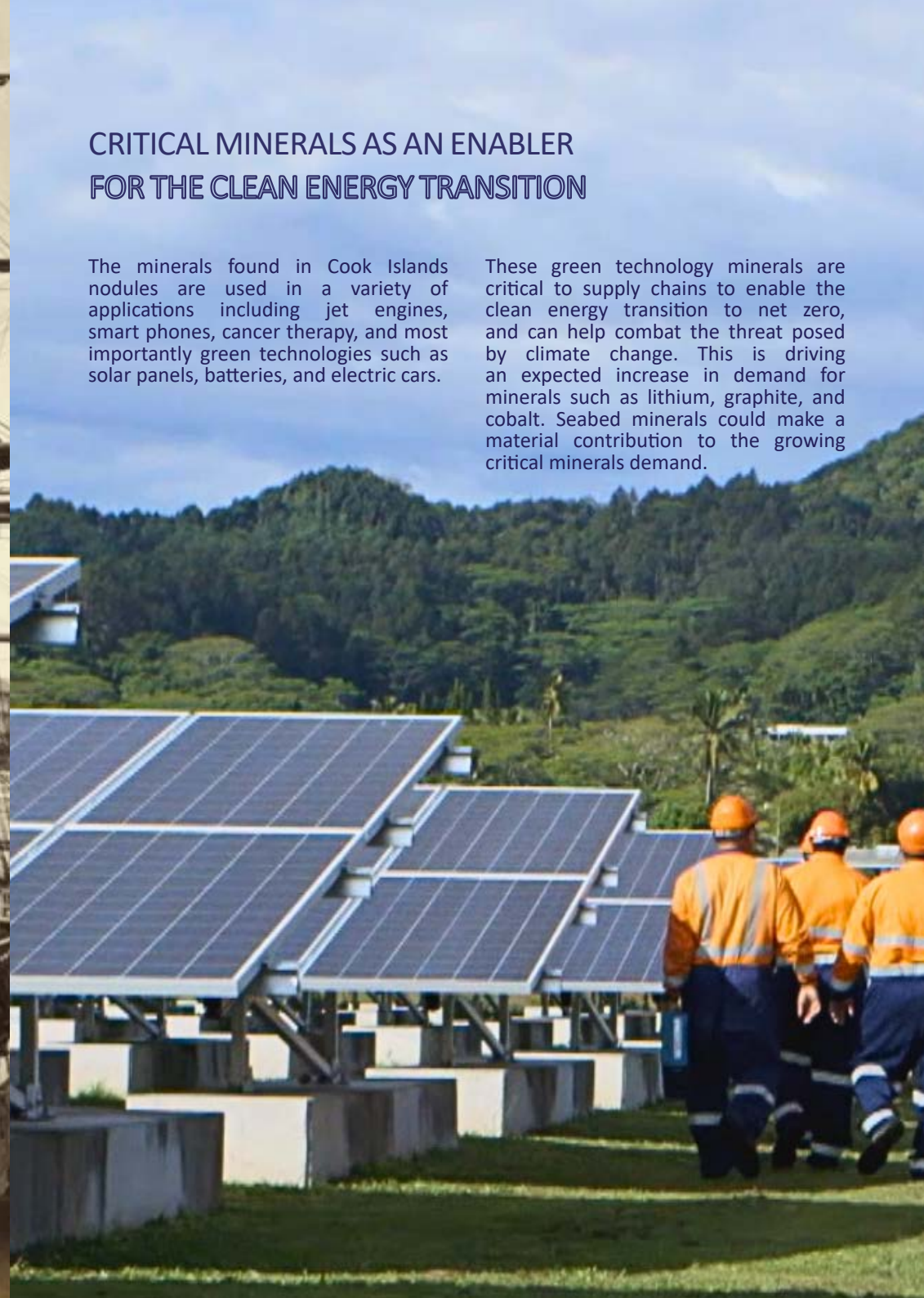
With the knowledge of our deep seabed resources over the last few decades, the Cook Islands has spent the last 20 years carefully developing our seabed minerals sector through advancing our regulatory framework, building our institutional capacity, and importantly bringing our people along the journey.



CRITICAL MINERALS AS AN ENABLER FOR THE CLEAN ENERGY TRANSITION

The minerals found in Cook Islands nodules are used in a variety of applications including jet engines, smart phones, cancer therapy, and most importantly green technologies such as solar panels, batteries, and electric cars.

These green technology minerals are critical to supply chains to enable the clean energy transition to net zero, and can help combat the threat posed by climate change. This is driving an expected increase in demand for minerals such as lithium, graphite, and cobalt. Seabed minerals could make a material contribution to the growing critical minerals demand.



TAKING A PRECAUTIONARY APPROACH

The Precautionary Approach is integral to our sustainable and responsible development of seabed minerals. It provides us with guidance and safeguards when assessing the risks of a proposed activity. It is enshrined in our Cook Islands laws, including the Seabed Minerals Act and Marae Moana Act.

In line with the precautionary approach, the Cook Islands does not currently allow minerals harvesting or mining to take place—effectively acting as a moratorium. This is because we currently do not have enough scientific certainty to make an informed decision on, whether or not, the impacts of minerals harvesting are likely to be acceptable and able to be managed.

Even if minerals harvesting were allowed to commence, the precautionary approach will continue to apply, including the use of adaptive management.

Moving forward, exploration research will be critical to be able to make informed decisions about this industry's future and understand what is needed to develop a sustainable, science-based, and well-regulated seabed minerals sector.

LAYING THE LEGISLATIVE FOUNDATIONS

2009

The Cook Islands takes its first substantive step towards realising the potential of our SBM by passing the Seabed Minerals Act 2009.

2012

The Cook Islands Seabed Minerals Authority is established.

2014

Cook Islands Seabed Minerals policy developed setting out the national SBM vision.

2015

The Seabed Minerals (Prospecting and Exploration) Regulations are passed, and amendments made to the 2009 Act to enable the SBMA to run a tender licensing process.

2017

The Marae Moana Act is passed to protect and conserve the ecological, biodiversity, and heritage values of the Cook Islands marine environment and effectively balance marine conservation with ecologically sustainable use of the marine environment and resources.

2019

Following a legislative review and extensive consultations, the 2009 Act is replaced by the Seabed Minerals Act 2019, to strengthen transparency and accountability and specifically incorporate environmental legal principles, including the precautionary approach.

2020

Exploration Regulations 2020 replace the Seabed Minerals (Prospecting and Exploration) Regulations 2015, setting out the mechanisms for a robust exploration licensing process.

2022

Following a comprehensive 16-month licensing process, the Cook Islands Government issue 3 exploration licences.

2023

The National Environment Service passes the Environment (Seabed Minerals Activities) Regulations to manage environmental matters relating to seabed minerals activities, safeguarding the delicate ecosystems of our seabed while promoting the long-term well-being of our communities.



THE COOK ISLANDS SEABED MINERALS EXPLORATION PROGRAMME

In February 2022, following a robust 16-month long process of evaluating and assessing applications, the Cook Islands granted its first ever exploration licences to CIC Ocean Research, Cobalt Seabed Resources and Moana Minerals.

This was an historic milestone for the Cook Islands marking our first real steps towards sustainably managing our own SBM resources.

Key highlights:

- At least 260,000 km² or 13% of the Cook Islands EEZ set to be explored providing a treasure trove of information and data about our Marae Moana.
- A fully equipped custom built exploration vessel is now based in the Cook Islands that is also available to conduct other marine scientific research in the Cook Islands and the region.

- Nearly \$NZ200 million over the next 5 years is expected to be spent on exploration work plans by the three licence holders – which will dramatically improve our knowledge and understanding of our deep ocean.
- \$NZ27m injection into local economy during exploration phase. Includes jobs, goods & services, training, and community programmes.
- Scientific exploration expeditions completed to date include seafloor mapping, geological and biological sampling, data collection through the water column on sound, temperature, salinity, currents, and biomass.



The image shows a vast, dense field of dark, rounded nodules covering the seafloor. The nodules are uniform in size and shape, creating a textured, cobble-like appearance. The lighting is bright, highlighting the individual nodules and the sandy sediment between them. A few small, bright green spots are visible, likely from the ROV's lights.

Nodule Field located
in the central area
of the Cook Islands
EEZ. Image taken
from a Remotely
Operated Vehicle
(ROV) during a 2023
scientific exploration
expedition.

BODIES INVOLVED IN THE SEABED MINERALS SECTOR

The responsible and sustainable development of the Cook Islands SBM sector requires input from a broad spectrum of society and engagement with internationally recognised experts. Various bodies have been established to facilitate their involvement.



Seabed Minerals Authority
Runanga Takere Moana
COOK ISLANDS

The Seabed Minerals Authority (SBMA) was formally established on 26 June 2012, and opened its offices on 8 March 2013.

SBMA is an independent regulatory agency responsible for the overall management of seabed minerals under Cook Islands jurisdiction.

SBM Working Group

In 2018, the SBM Working Group was established to ensure that relevant government agencies worked together cooperatively and cohesively to develop the SBM sector.

- Seabed Minerals Authority
- National Environment Service
- Ministry of Finance and Economic Management
- Office of the Prime Minister (Marae Moana)
- Ministry of Foreign Affairs and Immigration
- Crown Law Office
- Ministry of Transport
- Ministry of Marine Resources
- Ministry of Education
- Cook Islands Investment Corporation
- Business Trade Investment Board



SBM Advisory Committee

In October 2020, the SBM Advisory Committee was established to provide community input and advice to the Government relating to the development of the SBM sector. The Committee is made up of representatives from the church, traditional leaders, environmental advocates, private sector, youth, and academia. The SBM Advisory Committee replaced the previous advisory body established in March 2013.



Chair
Bishop Tutai Pere

Vice Chair
Makiuti Tongia

Committee Member
Makiroa Mitchell (SEP 20 - JUL 22)



Committee Member
Teoakamaru Mariri-Tepou

Committee Member
George George Williamson

Committee Member
Sam Napa

SBM Licensing Panel

In August 2021, the Minister appointed an independent Expert Licensing Panel (**Panel**) to evaluate and score licence applications against prescribed criteria and recommend to the Minister whether licences should be granted. The Panel is made up of local Cook Islanders among internationally recognised experts aiding in the evaluation of exploration licence applications to ensure a robust and rigorous process.



Garth Henderson

Pamela Maru

Chris Brown

Hannah Lily

Malcolm Clark



Alison Swaddling

Richard Johnson

Darryl Thorburn

Akuila Tawake

Andrew Lipman

BRINGING OUR PEOPLE ALONG THE JOURNEY

The Cook Islands people are our most important stakeholder. Government is committed to developing this sector in a sustainable and transparent way by placing high priority on ensuring our people are partners in this journey. We do this by keeping our community informed, empowered, and giving them a voice in the sectors development.

Since the establishment of the Seabed Minerals Authority, ongoing consultations have been carried out with numerous community stakeholder groups throughout Rarotonga and all our inhabited outer islands. These engagements, led in recent years by Prime Minister Brown along with the support of our Advisory Committee, have reached a wide range of people including Government, church, traditional leaders, students, and the wider community. The broad consensus is that our people support the Government's precautionary efforts to explore our SBM resources.





PARTNERSHIPS

National

Our national partnerships are critical as they help align our work programmes and leverage limited resources. Key national partnerships include the SBM Advisory Committee, SBM Working Group and the Marae Moana Technical Advisory Group.

International

The Cook Islands is not alone on its exploratory journey of the deep sea. SBM developments in international jurisdictions and the assistance of partners give us the confidence to exercise our sovereignty and take exploration development steps. These partnerships are invaluable as they keep us informed of developments within the sector; help us contribute to and learn from best leading practices; provide us with financial and in-kind support; and facilitate capacity building opportunities.

Over the last 10 years we have developed relationships with several international organisations, including to name a few:

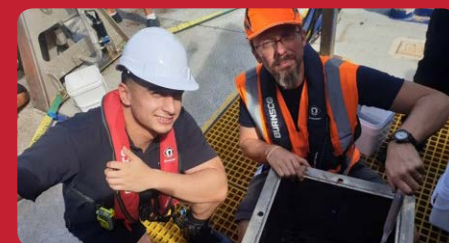
- International Seabed Authority
- Commonwealth Secretariat
- Pacific Community (SPC)
- New Zealand Environment Protection Agency
- National Institute of Water and Atmospheric Research
- New Zealand Ministry of Foreign Affairs and Trade
- New Zealand Parliamentary Counsel's Office
- Australian Department of Foreign Affairs and Trade
- Geoscience Australia
- International Marine Minerals Society
- Massachusetts Institute of Technology
- British Natural History Museum
- Norwegian Petroleum Directorate

GROWING THE CAPACITY OF COOK ISLANDERS

A key priority has been the capacity building and development of our Cook Islands people within the sector, whether through employment, training, or internships. This will help to ensure the sustainable future of the Cook Islands SBM sector.

An example of this is SBMA's Senior Knowledge Management Officer Rima Browne, the 2023 recipient of the ISA Secretary General's award for excellence in deep-sea research for her new geomorphological map of the Cook Islands. The award recognises young researchers who have made outstanding contributions to the advancement of scientific knowledge of the deep-sea environment.

Rima is the first Pacific Islander to receive this distinguished award, her work receiving accolades from an international judging panel of distinguished experts.



OUR JOURNEY OF DISCOVERY CONTINUES

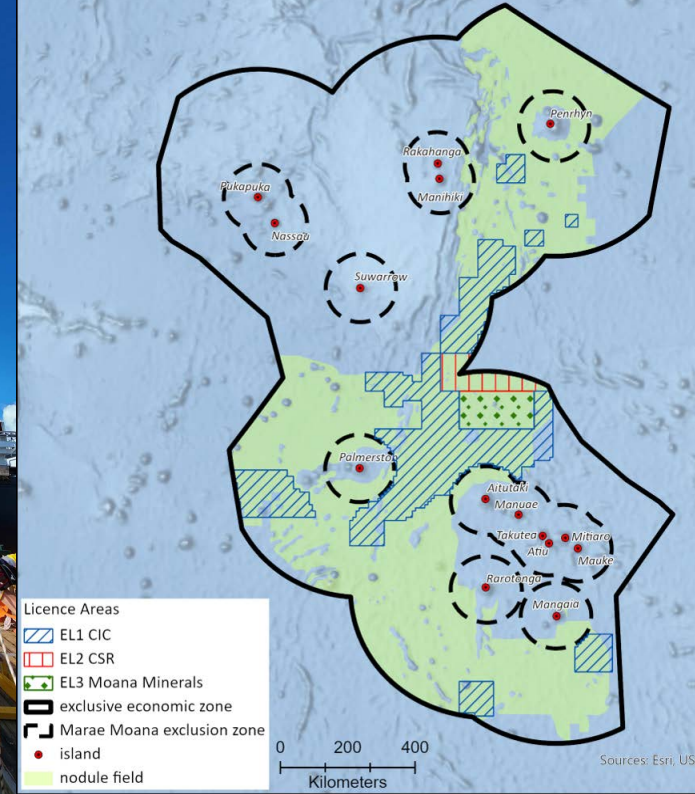
Building on the work of the last three decades, we are continuing to make significant advancements in our scientific understanding of our deep sea, especially since the commencement of our Exploration Programme. This includes:

- A series of new seabed survey datasets resulting from the implementation of a range of state of the art sampling equipment including the first remotely operated vehicle (**ROV**) to visit the nodule fields of the Cook Islands.
- Marine scientific research undertaken outside designated exploration license areas via SBMA's small-scale environmental permit.
- Seabed Habitat Management Zones (**HMZ**) established, contributing to the Cook Islands national marine spatial planning
- An online exploration data repository has been set up. This sits alongside the exploration licence register of titles to ensure a high level of transparency by government.
- Publication of the first JORC compliant mineral resource estimate for the Cook Islands
- Environmental studies progressed towards a seabed minerals regional environmental management plan (**REMP**) workshop scheduled for 2024.



"It is like turning on a light in a dark room, building our collective knowledge and understanding. This is why science and research is critical. It sets the foundation for the future work that we need, to manage it well"

Prime Minister Mark Brown





Seabed Minerals Authority
Runanga Takere Moana
COOK ISLANDS



sbma.gov.ck