# Staff Report 63

## **PROPOSED ACTION:**

Consider supporting AB 1832 (Rivas), which would ban hard mineral seabed mining in state waters subject to tidal influence, except as provided.

### BACKGROUND AND PURPOSE:

Throughout the last few decades, the Commission, like other governmental entities in California, adapted its work in response to climate change and other emergent environmental and social challenges. When the Commission was established, in 1938, oil, gas, and mineral extraction were among its core responsibilities. Hard mineral extraction from tide and submerged lands has been authorized, via a lease issued by the Commission or its predecessors, since the early 20<sup>th</sup> century. At that time, there was no awareness of climate change, no California Environmental Quality Act, Coastal Act, Clean Air Act, or Clean Water Act—all this is to say that much has changed in the last century.

Large swaths of the seabed are covered with potentially mineable and potentially valuable metals. Seabed mining is when minerals and deposits are extracted from the seabed floor. It has been likened to sucking up potato-sized rocks from the ocean floor. The minerals available on the sea floor are typically rich in manganese, nickel, copper, and cobalt. International waters contain the highest volume of valuable minerals. The International Seabed Authority, based in Jamaica, regulates and controls all mineral-related activities in the international seabed area. No deep seabed mining in international waters can start until the International Seabed Authority approves regulations to create a legal and technical framework for seabed mining. The International Seabed Authority is comprised of 168 member States and the European Union. The United States is not a member of the International Seabed Authority. The International Seabed Authority regulations will not apply to California state waters.

This past June, the tiny country of Nauru, in Micronesia, northeast of Australia, invoked what is known as the two-year rule. Under this rule, the International Seabed Authority "shall" finalize its regulations within two years of a member state request, which means that the Authority has 18 months, until July 2023, to complete its regulations. Nauru is sponsoring a company called Nauru Ocean Resources, a subsidiary of a Canadian firm called the Metals Company, that wants to mine a region of the Pacific Ocean between Hawaii and Mexico for hard minerals.

Many governments have called for a seabed mining ban or moratorium, and more than 600 marine scientists signed a statement advocating for a pause on deep sea mining. In their statement, the scientists said that deep sea mining could result "in the loss of biodiversity and ecosystem functioning that would be irreversible on multigenerational timescales." Several major companies have called for a seabed mining moratorium, including Patagonia, Google, and carmakers BMW and Volkswagen.

The seafloor has been called the largest untouched ecosystem in the world. The International Union for Conservation of Nature, the global authority on the status of the natural world and the measures needed to safeguard it, called for a global moratorium on deep sea mining in September 2021. The group issued a statement saying that "biodiversity loss will be inevitable if deep-sea mining is permitted to occur." Last September, the State of Washington enacted a law banning seabed mining. AB 1832 is structured similarly to that bill and includes analogous definitions.

The Commission is responsible for protecting California's Public Trust lands, including most of the land subject to the ban in this bill. Proponents of a ban contend that deep seabed mining can irrevocably destroy marine ecosystems, cause noise pollution, and is at odds with commercial and recreational fishing. Bill proponents characterize deep seabed mining as taking a giant vacuum to the seafloor. They highlight that while we know more than ever about the deep ocean, there is still much we do not know.

Seabed mining is not one of the most pressing issues facing California—nobody is seeking to mine California's seabed for hard minerals, and nobody has ever applied to the Commission for authorization to do so. But things do not necessarily have to rise to a problematic level before action is taken. Seabed mining is at odds with California's role as an environmental leader and with its many statutes, policies, and executive orders to protect the environment and the ocean. The Pacific Ocean is facing unprecedented challenges from acidification, over-fishing, and pollution. California's Pacific coast is among the most dazzling in the world and the marine ecosystem underpinning it is invaluable. Protecting this ecosystem and preserving public access is among the Commission's core responsibilities. Commission staff cannot conceive of any scenario where it might be acceptable to expose the Pacific seabed to the enduring and irreversible destruction that could ensue if hard mineral seabed mining is allowed.

The Commission has jurisdiction over the State's tide and submerged lands, except where the Legislature has granted these lands to local jurisdictions to hold in trust. And even in those instances, the Commission retains oversight authority. Existing law authorizes the Commission and trustees to issue leases to use these lands for various purposes, including to extract minerals. AB 1832 would repeal the authority of the Commission or a trustee of granted public trust lands to issue hard mineral extraction leases on state waters subject to tidal influence, except for waters situated east of the Carquinez Bridge on Interstate 80. Hard minerals are defined as natural deposits of valuable minerals, including metals and placer deposits of minerals, nonmetallic minerals, gemstones, ores, gold, silver, copper, lead, iron, manganese, silica, chrome, platinum, tungsten, zirconium, titanium, garnet and phosphorous. Hard minerals exclude rock, gravel, sand, silt, coal, and hydrocarbons.

Although the Commission has never issued a lease to authorize extraction of the hard minerals associated with seabed mining, it has issued sand mining leases. The Commission currently manages four leases that authorize sand mining in the central San Francisco Bay. AB 1832 will not restrict the Commission's authority to renew these leases or to issue new sand mining leases in this area or elsewhere in California because AB 1832 excludes rock, gravel, sand, silt, coal, and hydrocarbons from the leasing prohibition, and because sediments are not among the hard minerals defined in the bill.

#### **BILL INFORMATION:**

AB 1832 contains the following findings and declarations:

(a) Seabed mineral mining is not consistent with the public interest, public trust, or public rights to navigation and fishing that are three key principles of the common law public trust doctrine embodied in the California Constitution: the right to fish, pursuant to Section 25 of Article I, the right to navigate, pursuant to Section 3 of Article X, and the right to access public tidelands and submerged lands, pursuant to Section 4 of Article X.

(b) Seabed mining poses an unacceptably high risk of damage and disruption to the marine environment of the state. It is in the best interest of the people of California that leasing for hard mineral mining at the seafloor be prohibited.

(c) California marine waters are home to rich, diverse, globally significant ecosystems, including the deep-water column seafloor. These environments host millions of species, a biodiversity that may even be richer than tropical rainforests.

The extent of this diversity is still largely unknown, which makes its disruption by industrial-scale mining a perilous choice.

(d) The seafloor has provided compounds to help treat damage, from cancer to inflammation and nerve damage, and compounds used for analyzing illness.

(e) California's deep-water column and seafloor are critically important to people: indigenous, settler, and immigrant communities maintain strong spiritual, cultural, and economic connections to the deep ocean.

(f) Seabed mining could erode the sovereignty and harm the ancestral lands and waters of California Native American tribes.

(g) Seabed mining poses risks to the state's existing ocean-dependent industries, including commercial fishing, recreational fishing, and tourism.

(h) The damage from seabed mining could take several forms. Large machinery could remove or destroy entire communities of sponges, corals, kelp forests, and other marine life. Sediment clouds, some capable of traveling long distances, could smother or negatively impact the feeding and reproduction of other marine life, including plankton, benthic fish like halibut and groundfish, and pelagic fish like salmon, tuna, billfish, and forage species. These sediment plumes as well as the associated noise may negatively impact whales, dolphins, and other marine mammals throughout the region. Also at risk are the breathtaking beaches, tide pools, and rocky reaches that help support a multibillion-dollar tourism industry.

(i) The legislatures of the States of Oregon and Washington have both passed analogous legislation to prohibit seabed mining in their state waters, in 1991 and 2021, respectively. The call for a global moratorium on seabed mining has grown, arising from indigenous peoples, citizens, scientists, and companies in technology and car manufacturing that require hard minerals. In June of 2021, the European Parliament adopted a resolution in support of a moratorium on seabed mining. In September 2021, 81 governments and governmental agencies attending the International Union for Conservation of Nature (IUCN) World Conservation Congress voted in favor of a moratorium.

(j) California state waters do not represent a marketable source for battery metals, the emerging justification for extraction interest at the seafloor globally. The most likely interest would occur for two different types of extraction in two distinct geographic areas: (1) California's north coast, in the hunt for gold, titanium, and other precious and semiprecious metals; and (2) the Southern California Bight,

searching for phosphorites typically used in industrial fertilizer and not currently in short supply.

(k) Leasing authority for California's tidelands and submerged lands is held with the State Lands Commission, except for those instances where the Legislature has granted in trust the state's sovereign lands to local governments to manage on behalf of the state. In the absence of legislation, California is required to accept applications for hard mineral exploration and extraction leases along its coast, and to consider those applications on a case-by-case basis.

(I) An estimated 0.01 percent of the deep seafloor has been explored worldwide. History is fraught with hard lessons learned about destroying that which we do not know or understand. The issue of seabed mining emphasizes the need to take a precautionary approach, both in our state and as a global community.

AB 1832 does the following:

- Repeals the Commission's authority to issue leases to extract minerals from state waters subject to tidal influence except for waters situated east of the Carquinez Bridges on Interstate 80. The Commission is permitted by statute to issue such leases when it appears that such leases and associated operations will not interfere with the trust on which the lands are held or substantially impair the public right to navigation and fishing.
- 2. Prohibits the Commission or a local trustee of granted public trust lands from issuing a lease or permit to extract or remove hard minerals from state waters subject to tidal influence except for waters situated east of the Carquinez Bridge on Interstate 80.
- 3. Defines hard minerals as natural deposits of valuable minerals, including, but not limited to, metals and placer deposits of metals, nonmetallic minerals, gemstones, ores, gold, silver, copper, lead, iron, manganese, silica, chrome, platinum, tungsten, zirconium, titanium, garnet, and phosphorus. Excludes rock, gravel, sand, silt, coal, oyster shells, or hydrocarbons.
- 4. States that the bill does not prohibit scientific research or collections conducted by, or on behalf of, an educational, scientific, or research institution or a government agency.

## **OTHER PERTINENT INFORMATION:**

- 1. Pew Charitable Trusts, a proponent of AB 1832, requested that the Commission include a seabed mining ban in its new strategic plan, but the Commission declined to do so, indicating that the appropriate way to pursue a ban was through legislation.
- 2. The Monterey Bay Aquarium and Surfrider Foundation, co-sponsors of AB 1832, state, in support of AB 1832, "Seabed mining can destroy whole communities of plants and animals on the seafloor, leaving behind habitat that may never recover due in part to the slow growth times that characterize life in the deep sea ... this extractive industry is growing worldwide, and California cannot be too cautious. Industry is increasingly focused on areas of the deep sea as new sources of certain metals and minerals. Companies state that this is based on an increased demand for these metals and minerals for use in batteries for cell phones, electric vehicles, and energy storage and other applications ... Now is the time to protect our waters and the seabed."
- 3. AB 1832 is supported by the following organizations: 7th Generation Advisors, Audubon California, Beach Ecology Center, Benioff Ocean Initiative, Bolsa Chica Land Trust, California Association of Zoos & Aquariums, California Coastal Protection Network, California Institute for Biodiversity, California Interfaith Power & Light, California Marine Sanctuary Foundation, Californians Against Waste, Calpirg Students, Dana Point Whale Watching Company, Defenders of Wildlife, Earthworks, Environment California, Environmental Action Committee of West Marin, Environmental Defense Center, Environmental Entrepreneurs, Environmental Working Group, Friends Committee on Legislation of California, Grind and Proper Hospitality, Heal the Bay, Indigenous Marine Conservation Institute, Marine Mammal Center, the Monterey Bay Aquarium (Co-sponsor), Monterey Bay Whale Watch, National Parks Conservation Association, NRDC, Ocean Conservancy, Oceana, Oceanic Preservation Society, Offishial Business, Patagonia INC., Physicians for Social Responsibility - San Francisco Bay Area Chapter, Pier 23 Cafe Restaurant & Bar, Plastic Pollution Coalition, REV Ocean, Santa Barbara Zoo, Save Our Shores, Seaworld Parks & Entertainment, Sierra Club California, Stoke, Surf Industry Members Association, Surfrider Foundation (Co-sponsor), Sustainable Ocean Alliance, Tackle Warehouse, The Last Plastic Straw, The Nature Conservancy, Thresher Boats, Wholly H2O, and Wildflower Event.
- 4. There is no known opposition to AB 1832. Last month, the Assembly Natural Resources Committee approved AB 1832 on an 11-0 vote and referred the bill to

the Assembly Appropriations Committee with a recommendation to place the bill on the consent calendar.

#### **RECOMMENDED ACTION:**

It is recommended that the Commission:

Support AB 1832 (Rivas), which would ban hard mineral seabed mining in state waters subject to tidal influence, except as provided.