

Staff Report 69

PROPOSED ACTION:

Consider supporting AB 655 (Petrie-Norris) that would prohibit a person from selling, possessing, importing, transporting, transferring, releasing alive in the state, or giving away without consideration all saltwater algae of the genus *Caulerpa*, except possession for bona fide scientific research.

BACKGROUND AND PROPOSED LEGISLATION:

Existing law prohibits a person from selling, possessing, importing, transporting, transferring, releasing alive in the state, or giving away without consideration the saltwater algae of nine *Caulerpa* species: *C. taxifolia*, *C. cupressoides*, *C. mexicana*, *C. sertularioides*, *C. floridana*, *C. ashmeadii*, *C. racemosa*, *C. verticillata*, and *C. scapelliformis*. A person who violates these provisions is subject to a civil penalty of not less than five hundred dollars and not more than ten thousand dollars for each violation.

AB 655 would expand the prohibitions related to specific species of *Caulerpa* to all *Caulerpa* species, of which there are over 100. *Caulerpa* is a genus of saltwater algae mostly found in tropical regions, but its distribution may also extend to temperate locations. Diversity is highest in the Caribbean and the Indo-Malay region, as well as in southern Australia, where a majority of *Caulerpa* species are endemic. There are no *Caulerpa* species native to California. *Caulerpa* species pose a substantial threat to marine ecosystems in California, particularly to the extensive eelgrass meadows and other sea floor environments that make coastal waters such a rich and productive environment.

Caulerpa is a genus of non-native green alga with extraordinary invasive potential. It is typically found in shallow intertidal zones and can reach up to depths of 100 meters. *Caulerpa* can adapt and thrive in different environmental conditions, which contributes to their potential for becoming invasive species. Some of their traits include having a high tolerance for a wide range of temperatures, capacity for asexual reproduction (through fragmentation), fast growth rate, as well as the capacity for nutrient intake from sediments. Once it spreads, *Caulerpa* has profound impacts on coastal habitats and the marine environment, choking out native seaweeds and stealing habitat from native marine life. *Caulerpa* is one of the most sought-after algae for marine aquariums and it is possible to spread the algae through materials discarded from aquariums.

In 2000, *Caulerpa taxifolia* was detected in two southern California waterbodies. Its arrival prompted the development of the Southern California Caulerpa Action Team (SCCAT), a group of governmental and non-governmental organizations focused on quickly eradicating the highly invasive *Caulerpa* species. Even so, it took California over six years and seven million dollars to eradicate it.

The SCCAT was revived in early 2021 after a population of another species, *Caulerpa prolifera*, was detected in the channel entrance of Newport Harbor near China Cove. *Caulerpa prolifera* is native to Florida and other subtropical and tropical locations and is not among the nine currently prohibited species in California. The recent detection in Newport Harbor marked the first positive identification of *Caulerpa prolifera* on the West Coast; it is closely related to the *Caulerpa taxifolia* found in southern California that was eradicated in 2006. The infestation in Newport Bay is ongoing and will likely take several more years and millions of dollars to eradicate.

The California Department of Fish and Wildlife and the Santa Ana Regional Water Quality Control Board chair the SCCAT. The State Lands Commission, U.S. Fish and Wildlife Service, U.S. Army Corp of Engineers, National Oceanic and Atmospheric Administration, the City of Newport Beach, Merkel and Associates (a contractor), and Marine Taxonomic Services (also a contractor) are steering committee members. The SCCAT meets regularly to discuss survey plans and results, eradication design, implementation, results, funding, and outreach. The Commission's role on the SCCAT is mostly advisory since the *Caulerpa* population discovered in 2021 is located on lands legislatively granted to the City of Newport Beach to hold and manage in trust. In the early days of detection, there was fear that tidal action could cause fragmentation and deposition of *Caulerpa* on state lands south of the channel entrance, but fortunately that did not happen.

AB 655 would close a gap in existing law and protect state lands in the marine environment under the Commission's jurisdiction. According to NOAA Fisheries, any species of *Caulerpa* that is allowed to establish and spread in coastal areas may adversely impact local fisheries and disrupt seagrass communities important to protected species. It can proliferate quickly and harm marine life through lost habitat. New data and infestations indicate that other species not protected under current California law pose a great risk. As a coalition of environmental and ocean-focused organizations writes in support, "[w]ithout a total ban, other infestations of *Caulerpa* are all but guaranteed to continue; all it takes is a single piece of algae to find its way into the ocean. Moreover, while *Caulerpa* is a popular alga in the salt-water aquarium hobby, there are several alternatives. This bill will work to protect our coastal ecosystems and native seagrasses from this serious invasive genus of algae."

One of the Commission's key responsibilities, through its Marine Invasive Species Program, is to move the State expeditiously toward the elimination of the discharge

of nonindigenous species into state waters. AB 655, similarly, is intended to prevent the introduction of harmful nonindigenous species and protect California's coastal habitat and marine environment. Limiting the ban to the nine species has not prevented new introductions. What is needed now is a ban of the entire genus *Caulerpa*.

OTHER PERTINENT INFORMATION:

1. AB 655 is supported by Audubon California, California Coastal Protection Network, California Coastkeeper Alliance, Coachella Valley Waterkeeper, Humboldt Baykeeper, Huntington Beach Wetlands Conservancy, Inland Empire Waterkeeper, Los Angeles Waterkeeper, Marine Taxonomic Services, Ltd., Monterey Waterkeeper, Orange County Coastkeeper, Russian Riverkeeper, San Diego Coastkeeper, Santa Barbara Channel keeper, Sierra Club California, Surfrider Foundation, and The Otter Project. The bill has not received any opposition.
2. The City of San Diego has adopted an ordinance banning the possession, sale, and transport of the entire genus of *Caulerpa* within city limits.

EXHIBIT:

- A. AB 655

RECOMMENDED ACTION:

It is recommended that the Commission:

Consider supporting AB 655 (Petrie-Norris) that would prohibit a person from selling, possessing, importing, transporting, transferring, releasing alive in the state, or giving away without consideration all saltwater algae of the genus *Caulerpa*, except possession for bona fide scientific research.

Exhibit A

AMENDED IN ASSEMBLY FEBRUARY 23, 2023

CALIFORNIA LEGISLATURE—2023–24 REGULAR SESSION

ASSEMBLY BILL

No. 655

Introduced by Assembly Member Petrie-Norris

February 9, 2023

An act to amend Section ~~5500~~ 2300 of the Fish and Game Code, relating to ~~fish~~ *algae*.

LEGISLATIVE COUNSEL'S DIGEST

AB 655, as amended, Petrie-Norris. ~~Waters of the state inhabited by fish: use of explosives.~~ *Fish and wildlife: aquatic invasive species: Caulerpa.*

Existing law prohibits a person from selling, possessing, importing, transporting, transferring, releasing alive in the state, or giving away without consideration the salt water algae of enumerated Caulerpa species, except possession for bona fide scientific research, as provided. Existing law subjects any person who violates these provisions to a specified civil penalty and to specified infraction or misdemeanor penalties.

This bill would instead prohibit a person from selling, possessing, importing, transporting, transferring, releasing alive in the state, or giving away without consideration all salt water algae of the genus Caulerpa, except that possession for bona fide scientific research.

Because this bill expands the scope of conduct subject to criminal penalties, the bill would impose a state-mandated local program.

The California Constitution requires the state to reimburse local agencies and school districts for certain costs mandated by the state. Statutory provisions establish procedures for making that reimbursement.

This bill would provide that no reimbursement is required by this act for a specified reason.

Existing law prohibits the use of explosives in the waters of this state inhabited by fish, except under a permit first obtained by the user from the Department of Fish and Wildlife consistent with terms and conditions set by the Fish and Game Commission, or except in case of emergency, to remove an accidental obstruction to the flow of water.

This bill would make a nonsubstantive change to this provision:

Vote: majority. Appropriation: no. Fiscal committee: ~~no~~yes.
 State-mandated local program: ~~no~~yes.

The people of the State of California do enact as follows:

1 SECTION 1. Section 2300 of the Fish and Game Code is
 2 amended to read:

3 2300. (a) No person shall sell, possess, import, transport,
 4 transfer, release alive in the state, or give away without
 5 consideration the salt water algae of the ~~Caulerpa species: taxifolia,~~
 6 ~~eupressoides, mexicana, sertulariodes, floridana, ashmeadii,~~
 7 ~~racemosa, verticillata, and seapelliformis.~~ *genus Caulerpa.*

8 (b) Notwithstanding subdivision (a), a person may possess, for
 9 bona fide scientific research, as determined by the department,
 10 upon authorization by the department, the salt water algae of the
 11 ~~Caulerpa species: taxifolia, eupressoides, mexicana, sertulariodes,~~
 12 ~~floridana, ashmeadii, racemosa, verticillata, and seapelliformis.~~
 13 *genus Caulerpa.*

14 (c) In addition to any other penalty provided by law, any person
 15 who violates this section is subject to a civil penalty of not less
 16 than five hundred dollars (\$500) and not more than ten thousand
 17 dollars (\$10,000) for each violation.

18 SEC. 2. *No reimbursement is required by this act pursuant to*
 19 *Section 6 of Article XIII B of the California Constitution because*
 20 *the only costs that may be incurred by a local agency or school*
 21 *district will be incurred because this act creates a new crime or*
 22 *infraction, eliminates a crime or infraction, or changes the penalty*
 23 *for a crime or infraction, within the meaning of Section 17556 of*
 24 *the Government Code, or changes the definition of a crime within*
 25 *the meaning of Section 6 of Article XIII B of the California*
 26 *Constitution.*

1 SECTION 1. ~~Section 5500 of the Fish and Game Code is~~
2 ~~amended to read:~~
3 ~~5500. It is unlawful to use explosives in the waters of the state~~
4 ~~inhabited by fish, except under a permit first obtained by the user~~
5 ~~from the department consistent with terms and conditions set by~~
6 ~~the commission, or except in case of emergency, to remove an~~
7 ~~accidental obstruction to the flow of water. Any person may appeal~~
8 ~~the department's decision to grant or deny a permit to the~~
9 ~~commission.~~

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