

Greater Farallones National Marine Sanctuary Accomplishments

Fiscal Year 2020

San Francisco-based Greater Farallones National Marine Sanctuary conserves an ocean area of 3,295 square miles off the northern and central California coast. Its wildlife, habitats, and cultural resources comprise an extraordinarily abundant and diverse marine ecosystem of global importance. Since 1981 it has protected endangered blue whales, white sharks, millions of seabirds, shipwrecks, and numerous threatened and endangered species.

Visit farallones.noaa.gov for more information.



Exploratory dives reveal rich fish diversity and new species

Greater Farallones and Cordell Bank national marine sanctuaries, along with Ocean Exploration Trust, conducted a joint cruise aboard the E/V *Nautilus* to visually survey the sanctuary's Point Arena South Essential Fish Habitat Conservation Area using remotely operated vehicles. Imagery revealed a high diversity of deep-sea fish and large aggregations of sponges, including a new carnivorous sponge species, *Asbestopluma* sp. Findings will assist NOAA Fisheries in identifying biologically complex areas of the seafloor that are most sensitive to bottom trawling and may need protection.



A California deep-sea sea star (*Rathbunaster californicus*) captures a splitnose rockfish (*Sebastes diploproa*).

Photo: Ocean Exploration Trust/NOAA

Virtual "Sharktoberfest" reaches global audience

More than 1,200 shark enthusiasts from 10 countries, including Indonesia, Croatia, and New Zealand tuned in live to the virtual Sharktoberfest™ to celebrate the white sharks of Greater Farallones. More than 2,000 viewers, and counting, have watched the program since. The sanctuary and a dozen partners featured the latest shark research, award-winning conservation films, and an expert panel discussion. Trivia and quizzes entertained and educated all ages. Sharktoberfest™ was co-sponsored with the Greater Farallones Association and Shark Stewards.



White shark patriarch "Tom Johnson" has been tracked in the sanctuary for more than 30 years.

Photo: VTWSC-MBA-NOAA

Sanctuary models coastal resilience leadership

The sanctuary expanded its leadership role in advancing regional climate adaptation. The sanctuary released a first-of-its-kind Coastal Resilience Sediment Plan, an ambitious 50-year roadmap for addressing climate-driven shoreline impacts. The sanctuary also founded a new committee of 17 “frontline” county, state, and federal agencies that will guide the plan’s coastal and ocean actions by restoring natural sediment supply and prioritizing nature-based solutions. These efforts were recognized as a forward-thinking model by the California Ocean Protection Council and will support sanctuary preparedness for future climate impacts.



Constant wave action reveals sediment strata and constantly reconfigures coast.
Photo: Wendy Kordesh/NOAA

Partnership with aviation authorities and flight school

The sanctuary’s Seabird Protection Network launched a sophisticated, interactive partnership with the Federal Aviation Administration Safety Team and San Carlos Flight Center to provide three online presentations to more than 1,033 pilots. Network staff demonstrated how pilots can fly high to avoid disturbing wildlife, stressing NOAA Regulated Overflight Zones. The sanctuary is home to major seabird populations, some still unrecovered from historic disturbances and egg harvesting. The programs drew the largest audience in the flight school’s history, with compelling use of animations and videos, and a focus on pilot safety and recreation.



Virtual overflights reveal seabird protection no-go zones to pilots to prevent disturbance.
Photo: Paul Hobi/NOAA

Looking Ahead

- Shotgun wads from waterfowl hunters are among the most common debris found on North-central California beaches. The sanctuary will launch a behavior change campaign centered on hunter values and motivations in order to reduce marine debris.
- Sanctuary educators will provide new, virtual *Deep-Sea Science* programs to 3rd - 5th grade students, highlighting an octopuses’ nursery and other fascinating, little-studied marine life in Pioneer Canyon and Davidson Seamount in Monterey Bay National Marine Sanctuary.
- The sanctuary will sponsor a symposium featuring multi-disciplinary research on diverse estuarine, offshore, and nearshore habitats, with emphasis on kelp forest ecosystems. Proceedings will inform the sanctuary’s kelp restoration efforts and condition report development.

NATIONAL MARINE SANCTUARY SYSTEM



The National Marine Sanctuary System is a network of underwater parks encompassing more than 600,000 square miles of marine and Great Lakes waters. The network includes a system of 14 national marine sanctuaries and Papahānaumokuākea and Rose Atoll marine national monuments.