

Volunteer Newsletter

A Summary of the 2021 Sampling Season

California Collaborative Fisheries Research Program – North Coast



Greetings Volunteers,

Thanks to your continued efforts and assistance we were able to complete the 7th season of CCFRP MPA surveys here on the North Coast. Over this time, we've conducted a total of 114 hook-and-line surveys and enlisted the help of 88 volunteer anglers. We have caught and released 12,036 (tagging **10,104**) total fish from **27** different species. During the 2021 season we conducted 12 surveys inside 2 MPAs and their reference sites and caught a total of 1,699 fish (515 tagged) representing 20 different species. We look forward to another successful season this year and can't wait to have you back out on the water with us! Please enjoy these pictures and some preliminary results from this very interesting 2021 sampling season.



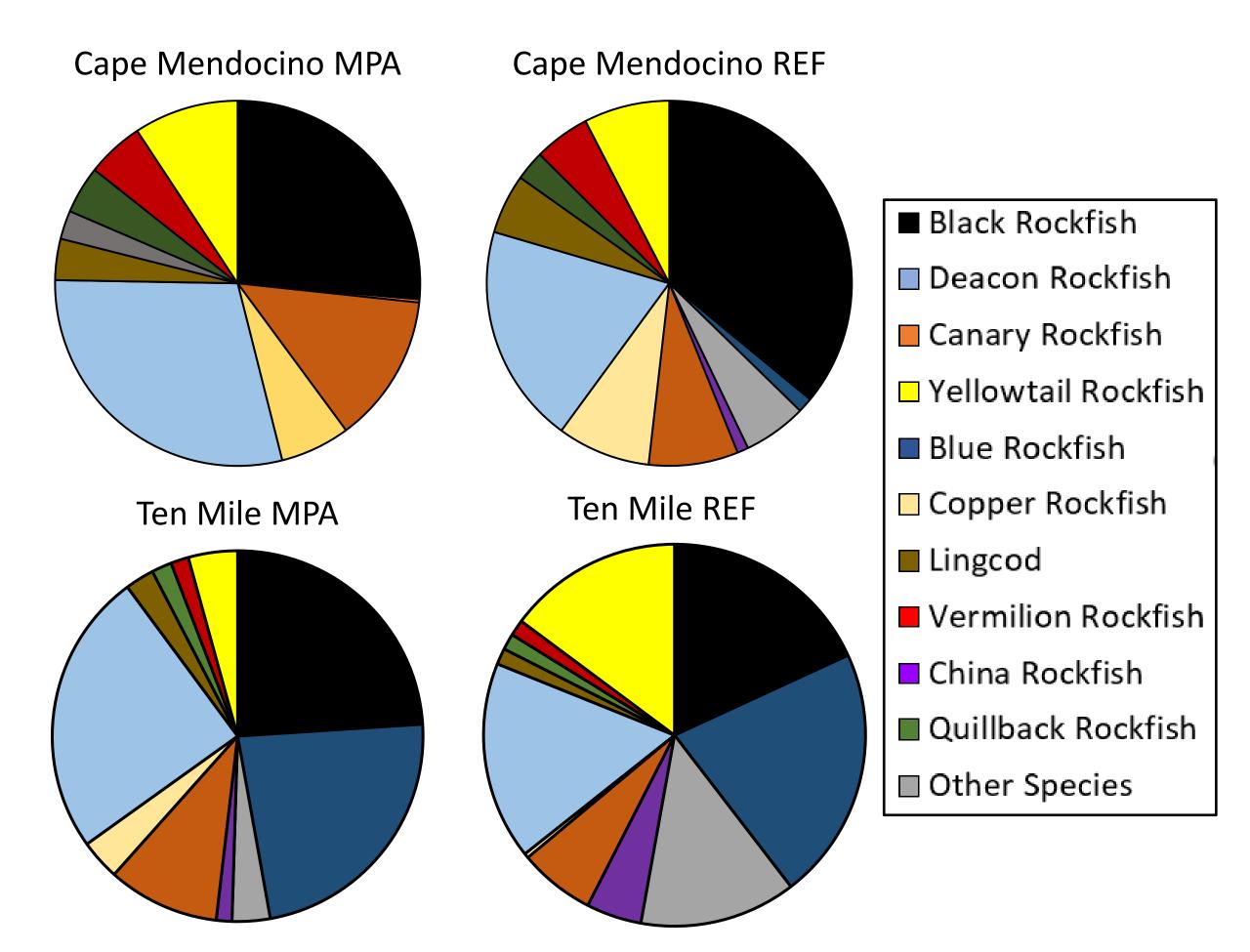
Don't forget to follow us on Facebook at NorthCoastCFR and follow CCFRP on Facebook, Instagram, YouTube, and Twitter (@CCFRP) to stay up to date on what is happening with MPA monitoring throughout the state!



We are already looking forward to the 2022 season. We will continue to sample the Ten Mile Reserve and South Cape Mendocino Reserve. Watch your emails for the sampling schedule this summer!



2021 Species Composition



Species compositions are most similar within paired sites (e.g., Cape Mendocino MPA and REF). Black, Deacon, and Canary rockfish comprise over 60% of the total catch at both the Cape Mendocino MPA and Reference sites, while China rockfish were caught in very low numbers (<1%). Blue rockfish were much more prevalent at the Ten Mile paired sites, making up over 20% of the total catch as opposed to less than 1% of the catch at the Cape Mendocino Sites.



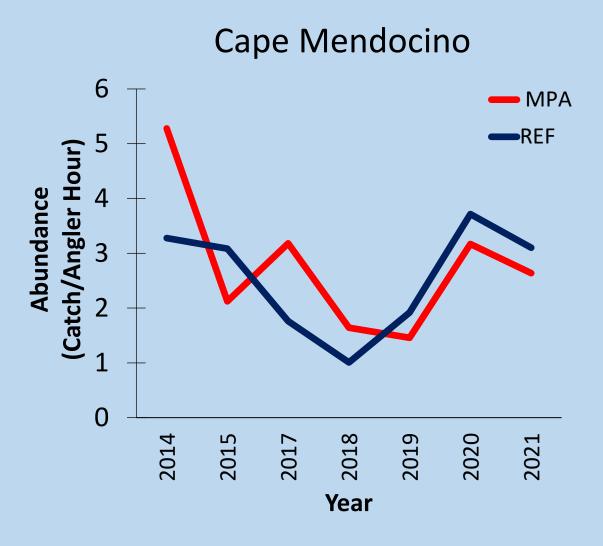




Black Rockfish Catch Over Time

Black rockfish consist of 34% of the total catch during CCFRP surveys beginning in 2014, making them our most commonly caught species. Bag limits for Black rockfish have fluctuated during our sampling years, ranging from 10 in 2014, down to 3 in 2017 and 2018. Below is a snapshot of how abundances have varied inside the Cape Mendocino and Ten Mile paired sites over time in our surveys compared to the bag limit of the species.

Year	2014	2015	2017	2018	2019	2020	2021
Black Rockfish Bag Limit:	10	5	3	3	4	4	10



Ten Mile MPA 3.5 REF (Catch/Angler Hour) 3 Abundance 2.5 2 1.5 1 0.5 0 2014 2015 2018 2019 2020 2017 2021 Year

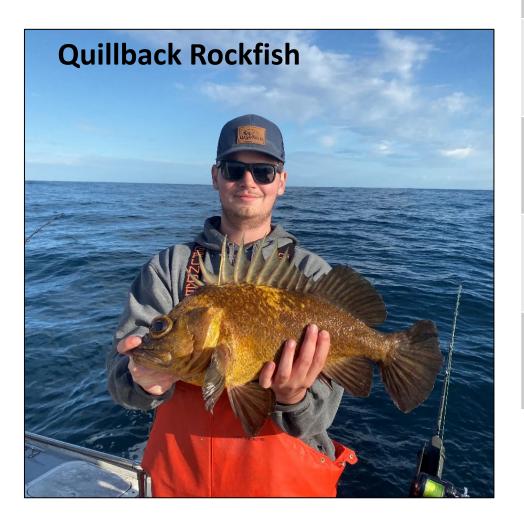
Sub-bag limits were imposed on Black rockfish between the years 2015 and 2020 to help rebuild the stock. While we do see some variability in Black rockfish catch over time, we found an overall trend of decreasing catch after 2014 when bag limits were decreased. By 2019, our surveys suggest that populations responded to the decreased fishing pressure, especially at the Ten Mile sites where we saw a dramatic increase in Black rockfish catch in 2020 and 2021.



2021's Largest Fishes







Species	Length
Black Rockfish	50 cm (20 in)
Blue Rockfish	41 cm (16 in)
Lingcod	89 cm (35 in)
Canary rockfish	60 cm (24 in)
Yellowtail Rockfish	43 cm (14 in)
Copper Rockfish	52 cm (20 in)
China Rockfish	38 cm (15 in)
Quillback Rockfish	47 cm (19 in)
Vermilion Rockfish	57 cm (22 in)
Olive Rockfish	48 cm (19 in)
Kelp Greenling	42 cm (17 in)
Yelloweye Rockfish	62 cm (24 in)
Cabezon	58 cm (23 in)

^{*}All values rounded to the nearest centimeter and inch, respectively

Thank you for your continued support!









We will see you on the boat this summer