

Long-term Marine Protected Area Socioeconomic Monitoring Program for Commercial and Commercial Passenger Fishing Vessel Fisheries in the State of California

Perspectives on the Health and Well-being of California's Commercial Fishing Communities in Relation to the MPA Network *Members of San Francisco Area's Commercial Fishing Community*

The Marine Protected Area (MPA) Human Uses Project Team¹ anticipates hosting over 25 virtual focus group conversations with fishermen throughout California from July 2020 through Spring 2021.² The information shared during these discussions is a core component of a study to gather and communicate information about the health and well-being of commercial and Commercial Passenger Fishing Vessel (CPFV) fishing communities in California, including impacts from MPAs. A key goal of this study is to convey fishermen's perspectives about the unique challenges and opportunities that fishing communities are facing to managers and decision-makers through a series of summaries and other products. The results of this study will be made available to inform discussions about MPA and fisheries management, including California's 10-year MPA network performance review.

For each focus group, a small number of fishermen representing a range of fishing interests were brought together to:

- provide their perspectives on their fishing community's health and well-being, including environmental conditions, markets, infrastructure, and social and political relationships, including impacts from MPAs; and
- share feedback about their focus group experience to help improve the process for future focus groups.

The focus groups included quantitative questions where fishermen were asked to score their port on various topics, and an open-ended qualitative discussion followed each question. This document summarizes both quantitative and qualitative findings from the focus group. More details about the methods used for each focus group discussion, including questions asked to participants and the approach to recruiting focus group participants, is available on the Project Team's website, <https://mpahumanuses.com/>. The website also hosts focus group conversation summaries and an interactive data explorer, which will be components of the final products developed upon completion of this project in 2021. For questions about this project, including focus group engagement and the content of this document, please contact us at hello@mpahumanuses.com.

Port Group: San Francisco Area Ports

Date: Monday, October 26, 2020

Participants: John Barnett, Nick Krieger, John Mellor, Ed Tavasieff

¹ Consisting of Humboldt State University researchers, Ecotrust, and Strategic Earth Consulting

² Previous versions of the summaries from other ports suggest there would be 30 focus groups through February 2021. The project has since evolved based on the needs of the fishing community and is reflected in all summaries moving forward.

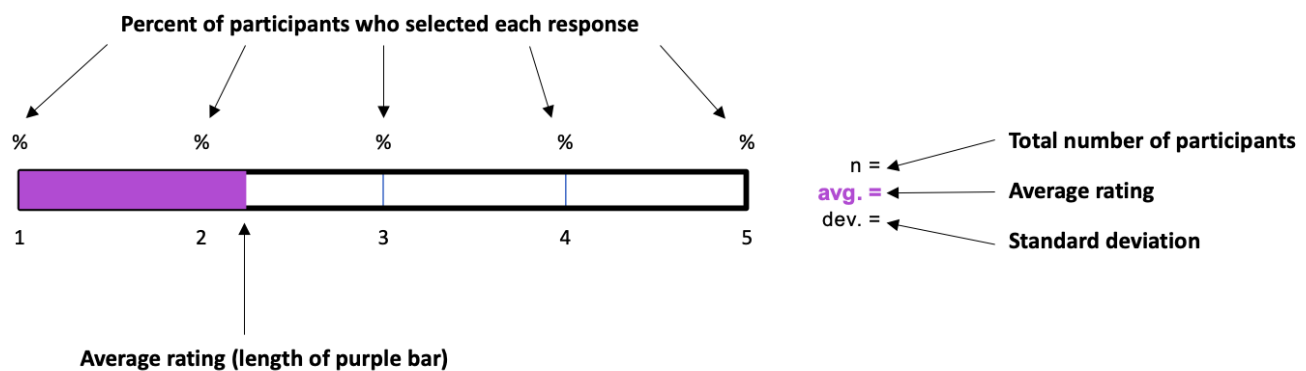
Overview

On October 26, 2020, four commercial fishermen operating out of the San Francisco area participated in the ninth focus group conversation. A detailed summary of the conversation is captured below, including:

- the numerical final scores (gathered via Zoom polls) for questions asked within each theme;
- a summary of participants' perceptions, insights, and perspectives related to each question; and
- direct quotes from participants that help to illustrate sentiments in their own words.

Guidance for Interpreting Figures

There are 17 figures displaying participant responses for questions that had a numerical/quantitative component. In those figures, the percentages located directly above the bar (between 1 (low) and 5 (high)) represent the percent of participants in the focus group who selected that response. The total number of focus group participants is labeled 'n' to the right of each figure. The length of the purple bar indicates the average rating for each question, also labeled 'avg.' to the right, and 'dev.' refers to standard deviation, or the extent to which scores deviated from one another. See below for an example figure. There are also two figures on pages 16 and 24 that display the average responses for each question in the well-being and MPA sections, respectively, from highest to lowest.



In addition to providing feedback to help refine our process and approach for future focus groups, participants requested several resources be shared with them, including:

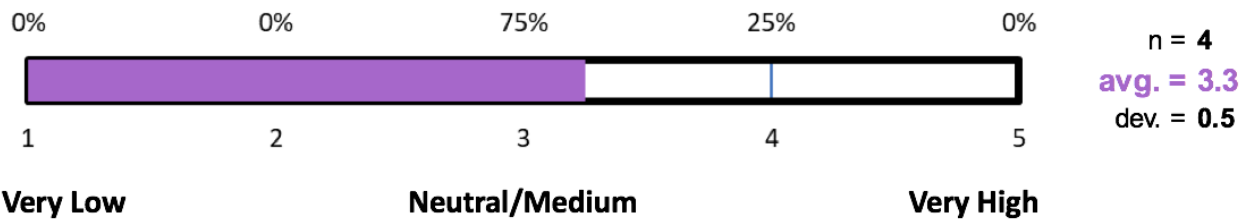
- [California Fisheries Data Explorer](#): This interactive site allows users to visualize commercial landings data (i.e., number of fishermen, pounds of fish landed, and revenue from fish landed) and CPFV logbook data (i.e., number of anglers, vessels, trips, and fish caught from specific fisheries and ports).
- [MPA Baseline Monitoring Program: North Central Coast](#)
 - [A Summary of the Marine Protected Area Monitoring Program 2010-2015, North Central Coast](#)

Our Project Team would like to express our appreciation to the four San Francisco area fishermen—John Barnett, Nick Krieger, John Mellor, and Ed Tavasieff—for their time and contributions to the focus group conversation.

Perceptions of Fishing Community Well-being

Well-Being, Environmental

1. Marine Resource Health - Present Overall, how would you rate the current health and sustainability of the marine resources on which fishermen from this port rely?



Discussion Summary Participants reported marine resource health varies across species but that the ecosystem is generally doing very well. They indicated politics and regulations affecting the fishing industry coincide with and affect the health of marine resources.

- One fisherman considered Dungeness crab to have natural cycles of years with high and low abundance. They said halibut is abundant, whereas salmon is affected by water politics related to dams and agriculture. Another fisherman perceived rockfish populations to be increasing, but since managers will not open the fishery, the fish are dying of old age before they can be caught.
- One participant stated water temperatures are normal and there is sufficient upwelling to support healthy marine ecosystems.
- One fisherman expressed the belief that fishing interests are not explicitly considered in management decisions and that threats to the health of marine resources tend to stem from how a fishery is managed.

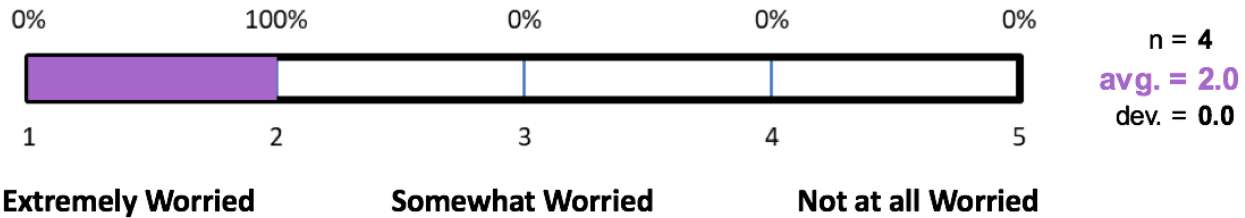
Participant Quotes

“The rockfish are basically dying of old age because nobody can catch them. There is no viable rockfish fishery even though the resource is probably at virgin biomass levels at this point after being shut down forever. [. . .] Salmon has always been problematic because of the politics of water use and dams and big agriculture taking all the water from the rivers.”

“Looking specifically at the health of the ecosystem, I'd say the ecosystem is doing very well currently. The water temperatures are what we would consider pretty normal, and the upwelling that drives the ecosystem is in place and it's booming. But that's a separate issue than how the industry's managed.”

“The pressures aren't on the actual fishery or on the species. It's more on the regulations surrounding fishing - species like [Dungeness] crab, for instance, the pressure is on whale entanglement, domoic acid, fair starts, and regional disputes. [. . .] There's pressures everywhere else, but the actual crabs are doing pretty well. So that particular fishery is an example of how I think we all feel, and salmon is the same way. It was actually a pretty good salmon season, but there is the worry of water and [. . .] the politics around water, which is a huge issue.”

2. Marine Resource Health - Future Concerns Overall, how worried are fishermen from your port about the future long-term health and sustainability of the marine resource populations on which you rely?



Discussion Summary Participants expressed concerns about the way marine resources are currently managed and what this could mean for long-term resource health and the future of the commercial fishing industry.

- One participant identified the politics of water management as a source of concern due to potential impacts on Dungeness crab and salmon, particularly the species abundance these fisheries rely on.
- Another participant highlighted the newly implemented regulations to address marine life entanglements and explained these regulations are hurting the sustainability of the Dungeness crab fishing industry.

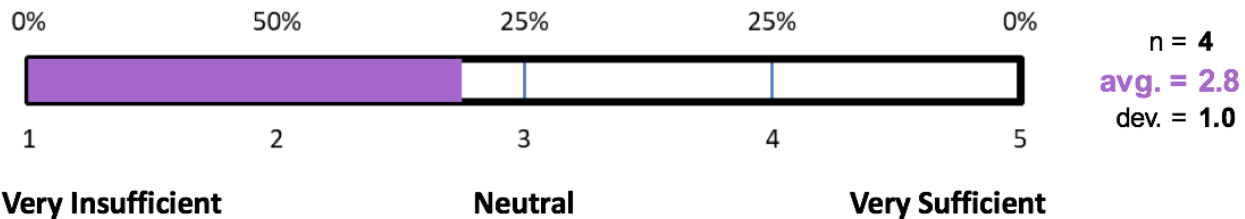
Participant Quotes

“I feel like I'm moderately worried about it [future marine resource health] because of management concerns and all the pressures on the fishery. I think people are worried [about] water issues; we aren't getting the water that we need for the juvenile crabs and salmon. So there's a lot of worry about policy, politics, and regulation, and I think that goes hand in hand with the populations of the species right now.”

“There's always climate disruption - we've seen the results of that back in 2014 and 2017 with the blob and the El Niño. Things can suddenly get disrupted in a major way. But I think most people are more worried about management and the runaway train aspect of the whale/Dungeness crab issue because without Dungeness crabs, I'd say most of the industry will disappear; it won't be viable for someone to be a full-time commercial fisherman with most of the operations that exist in California. But that's separate [from the health of the resource]. I mean, the crabs could be doing great, the resource could be doing great. But if we can't catch them, what good does it do us and what good does it do the people who want to eat seafood in California?”

Well-Being, Economic

3. Access to Harvestable Resources Overall, how would you rate your port in terms of the level of access that fishermen have to marine resources to support the local fishing fleet?



Discussion Summary Participants generally felt access to marine resources is limited and shared several factors they believe inhibit access, including restrictions on the Dungeness crab fishery, catch limits, and costs associated with acquiring fishing permits.

- One participant stated that while there could be high volumes of fish, a fishing season could change quickly and affect fishermen’s ability to access that abundance. For example, as a result of marine life entanglements in Dungeness crab gear, the Dungeness crab fishery has been closed months earlier than it traditionally has, greatly shortening the season. They believe this is a representation of what is to come for the industry. The public is focused on protecting whales but neglects to consider impacts on fishermen’s access to Dungeness crab. The participant stated the public believes the ocean is overfished and that fishermen are to blame, but the public does not understand the reality of these resources and their availability.
 - One participant shared that small to medium scale fishermen require a certain amount of productivity to stay in business and that those fishermen were really affected by restrictions on Dungeness crab. Due to issues related to access, they cannot turn to another fishery like rockfish to supplement their catch because it is not very profitable.
- One fisherman highlighted the number and type of fishing permits owned varies across fishermen and that those who have a more diverse permit profile are able to access more fisheries. Additionally, financial barriers exist to obtaining fishing permits, especially for newer fishermen.
- Another participant suggested open access provides opportunities to enter into some fisheries.
- One participant cited fishery viability and catch levels as an issue related to access. While halibut could be a good entry-level fishery because of the high volume of catch allowed, rockfish is not viable because the catch limits are too low.
- Several participants reported fishermen are no longer able to rely on ‘fall-back’ fisheries when they are unable to access one or multiple fisheries because those fisheries are no longer profitable due to catch limits.

Participant Quotes

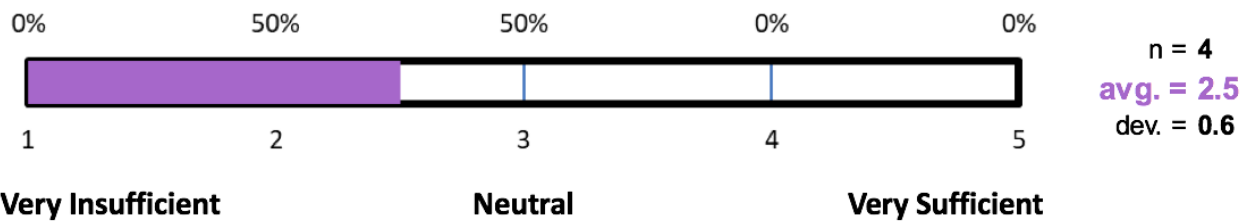
“What’s happened with the crab and the whales is potentially a representation of what’s more to come in fishing. We [fishermen] obviously care about the environment and we care about the whales. We don’t want to harm any whales. We don’t want to damage the environment. But look at the Department of Fish and ‘Game’ turned to the Department and Fish and ‘Wildlife.’ They’re not focusing on hunting anymore. They’re focusing on wildlife. They’re no longer considering those animals ‘game.’ So I think just in general, for some people, the way they look

at the resources has changed and the opportunities for fishermen are going to only get smaller and smaller because of that.”

“Permitting has a lot to do with access. The only real open access fisheries are your open access rockfish, lingcod, halibut, and white sea bass. Crabs are obviously permitted [. . .] It's not like every fisherman has every kind of permit, although maybe a handful do and are able to go and participate and have access to all the fisheries. So I kind of look at this in a way of going, well, it's sufficient for those that have the permits and insufficient for those who do not.”

“We used to have the ability to go out and get fish and then if halibut was bad, I'd go fish rockfish or if rockfish was not happening, I'd go fish salmon and all these different fisheries. And I used to call them fall-back fisheries. We don't have that opportunity anymore. And when they first came out with the rockfish qualifications, I qualified for all of them. But you know what? They told me I could get two hundred pounds in two months. That was just not economically viable to take and go for those permits. So I just let them go. I didn't even bother with them, but we used to have these fall-back fisheries which we used to depend on.”

4. Income from Fishing Overall, how would you rate the income that fishermen from your port earn from fishing in terms of supporting livelihoods?



Discussion Summary Participants indicated income from fishing is insufficient to support their livelihoods. As a result, several participants need to take on other jobs to supplement their fishing income.

- Participants reported fishermen do not make enough money from fishing to support themselves or a family. However, they believed younger fishermen can do well in the halibut and white sea bass fisheries if they put in the effort and have fewer expenses than older fishermen.
- One participant said fishermen need to fish multiple, profitable species (i.e., Dungeness crab and salmon) to survive in the industry. Otherwise, they need a second job to support their livelihoods.
- Several participants communicated their need to take on other jobs in the off-season, especially with the shortened Dungeness crab season, in order to make enough money to maintain their boats and permits.
 - One fisherman shared that they made half of what they normally would crabbing over the last two years. The value of their permit and boat has dropped which hinders their retirement.
- Another fisherman stated they do not have time to get a second job because they would not be able to keep up with their business, maintain their boat, and support their crew.
- Several fishermen explained the cost for fuel and bait has gone up even though they are earning less per pound. One fisherman mentioned that due to factors like tariffs and COVID-19, bait is now worth more than black cod.

Participant Quotes

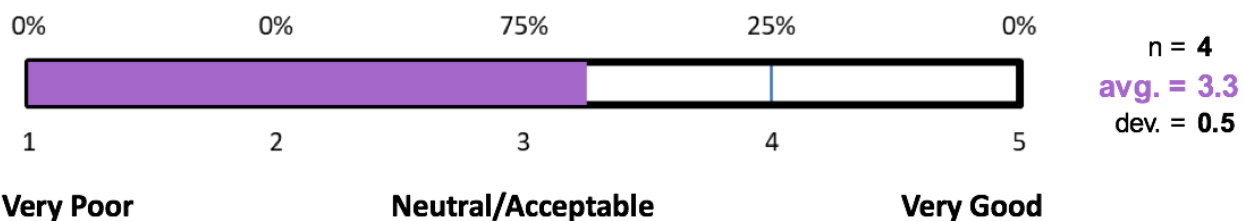
“There isn't enough money in these fisheries to just focus on that particular fishery unless you have another job, unless you have another permit, or unless you figure out how to pay less money to run these boats, because what you make isn't enough to support you or a family in the Bay Area without some other source of income.”

“There's a lot of off-season if you do just crab, and we may not get our spring crab fishery back. So that's going to put those guys into having to look for other jobs in the offseason, which a lot of these guys do. [. . .] So you have to look at having two separate jobs, fishing being one of them, to pay for everything because it's so expensive to have a boat, or you have to look at multiple fisheries, and everything is permitted.”

“I couldn't have another job - I couldn't maintain my boat and my crew and fish part of the year and then go do construction. I know people do that, but that wouldn't work for me at all because, meanwhile, I still have to pay for the upkeep, the boat, the berthage, the insurance, and keep a crew. If I don't keep my crew busy year-round, they're going to go away, and I can't really do it by myself.”

“Considering costs compared to revenue, the price of fuel, the price of bait is through the roof. The cost of everything else has gone up. None of the costs have gone down, the fixed costs, and you have to be able to pay your crew [because] they need to make money.”

5. Markets Overall, how would you rate the quality of the markets to which fishermen from your port are able to sell their catch?



Discussion Summary Participants noted fishermen in the San Francisco area have several marketing options with various market structures.

- One fisherman relies on bringing larger fish to market and expressed a concern with regard to people flooding the market with smaller fish.
- Several participants shared that as more people target halibut, the markets are becoming saturated and fishermen are having to sell in different ways (e.g., direct marketing off their boats). However, for fishermen whose focus is on production and selling to wholesalers, the direct marketing business model is not sustainable.
- Several fishermen identified direct sales to the public and internet sales as opportunities for fishermen to access new markets, though they are not preferred because they take time away from fishing. Fishermen can sell at a higher price through direct sales - especially for salmon, but not for halibut - which can be a good tradeoff.
- One participant shared how they do most of their business outside of the wharf, driving their product directly to market and doing their own paperwork.

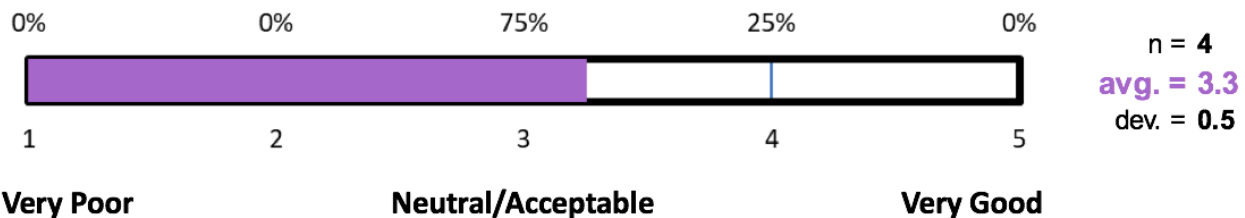
Participant Quotes

“Those [groups of people] that are fishing the Bay now actually do quite well, better than some of us old timers. The market structure that they're working with is different than what I'm traditionally involved in. My markets generally like larger fish. These guys are coming under a lot of very small fish and they flood the market. They are a concern at this point.”

“If everybody says, ‘OK, well, I'm going to go for halibut,’ then the market will get saturated and the processors will say, ‘no, we don't want any,’ and you have to go and sell them off the boat, which people have done. But that's not a viable answer because we're focused more on production and selling to wholesalers. That's our business model and in the last four or five years, we've watched it crumble.”

“I have dabbled in it [direct sales]. Typically, I would love to just come in, load to the market, and be done with it and go fishing the next day. But you have to take the time to sell the product. So that cuts into your fishing time. I don't want to do it. I would much rather go with the buyers. But if the buyers are loaded and you're stuck with trying to make a living and having to take and sell to the public and maybe spend that extra time, the price that you sell to the public is substantial.”

6. Infrastructure Overall, how would you rate the state of infrastructure and services that support commercial fishing in your port?



Discussion Summary Participants indicated that while the port’s infrastructure is acceptable, it could also be better.

- One participant stated they have access to a hoist, forklift, and freezer and attributed this to their long-standing relationship with the people who work at the port.
 - Another fisherman shared that the port was supportive of the fishing community after the May 2020 fire at Fisherman’s Wharf.
- Another participant mentioned the infrastructure is good in terms of having a dock and gear storage.
- One fisherman noted parking is difficult. Another participant compared this to Half Moon Bay where parking is better and there are also fewer homeless concerns.
- One participant recounted their past experience fishing out of Bolinas. There was no hoist and they had to drive their truck to San Francisco to sell their fish.

Participant Quotes

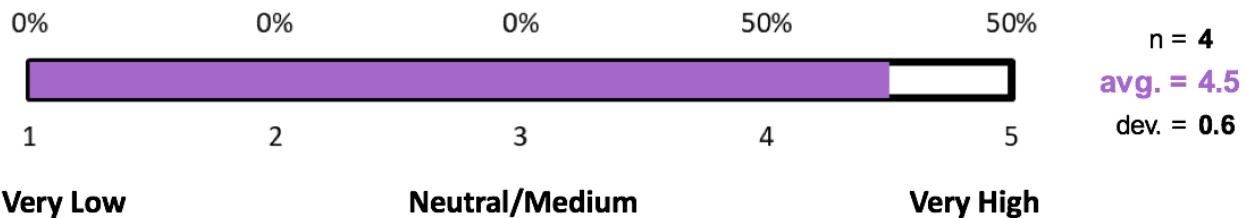
“I have access to a hoist, to a forklift, and I can do what I need to do with the freezers and stuff. I’ve been dealing with these people for decades so I have good relationships with them. So as

far as that goes, it's good. The port moves in strange ways, but ultimately we have a steel dock, we have gear storage. So that's all fine.”

“We have a lot of hoists. Could it be better? Yeah, but I think it's sufficient. I think it works. The fire was horrible, but we're still given space here in another shed for the year. We deal with things here in San Francisco because parking is hard. But the port helps us out in other areas.”

“I used to have a little boat that I fished out of Bolinas, and compared to not having a hoist and needing four wheel drive in my truck to drive down on the beach and carry baskets of crab to the truck so I could drive to San Francisco and sell them, being at Pier 45 is definitely easier and better, although when I go down to Half Moon Bay, that looks pretty nice. There aren't all the homeless and all the trash and there isn't the parking problem. So it could be worse, but it definitely could be better too.”

7. COVID-19 Impacts *How disruptive do you think COVID-19 has been to your port’s fishing operations?*



Discussion Summary Participants reported COVID-19 has been extremely impactful and believed they will likely continue to experience the effects of the pandemic in the coming years.

- Several participants stated they did not go fishing in the early part of the pandemic because markets were very limited.
 - One fisherman did not catch halibut even though there was high abundance. Another fisherman stated being able to catch a lot of fish helped them to offset losses elsewhere but that they had to negotiate their prices in order to ensure viability of their business.
 - One participant decided not to catch black cod because of the lack of available restaurant markets. They opted not to sell to the public because it is time consuming and they had to keep up with their other business.
- Participants stated there continues to be uncertainties with regard to price, demand, and overseas shipping/markets. They commented it is unclear what the price for their products will be when restaurants open back up.
- One fisherman noted COVID-19 provided an opportunity to make use of alternative markets, like advertising to the public on apps like Nextdoor.

Participant Quotes

“COVID was a disaster for us. We had a pretty good abundance of halibut this year, and I lost a lot financially just because of the fact I couldn't go [fishing] because I deal with restaurants and corporations that were affected by COVID quite intensely. So for me, it was a heavy wipeout that impacted me severely. However, abundance sort of mediated that a little bit because when I did get out, I was able to catch fair amounts of fish, good quantities of fish. So in some ways it was not that bad only because resource abundance was high when I finally could get out and go fishing. I had to negotiate price and it became acceptable, but it was tending towards going

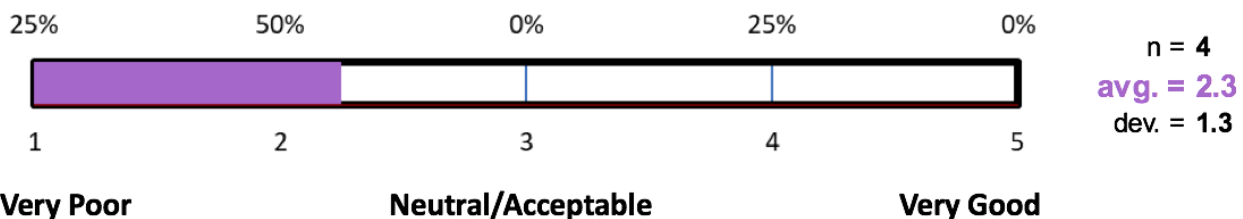
much lower. But I was able to work with my buyer to maintain a price that I could call the fishery viable this year.”

“COVID was definitely a strong impact on fishermen, and crab season’s coming up now too, I don't know what's going to happen - perhaps there's guys sitting on a lot of frozen stuff. So price structure this year, demand, who knows? One thing that is evolving at this point in time is something called Nextdoor: people that are selling fish or crabs, they're going on the Internet, basically selling to the public. And that's something that is probably going to be maybe some of the future coming up.”

“I was kind of in between boats most of the summer, but I had the opportunity to catch black cod before I sold my boat. And I didn't even bother because there just wasn't a market. The bait was more expensive than we were going to get for the black cod. And typically when I catch black cod, I try to catch as much open access quota as I can. And then the larger fish I would sell to a wholesaler and the smaller fish I sell to restaurants. But without the restaurants, I don't have enough traps and a big enough boat to catch all big fish. So it just wouldn't really be worth it to go out and only catch three or four hundred pounds of fish. It wouldn't probably break even on the trip. And then I thought about trying to sell all the fish to the public, but I just don't really want to deal with that. I don't want to drive around door to door and sell fish. I like being on the water. And with [my other] business, I'm already dealing with tons of emails and talking to people on the phone. I don't really want to do that with fish as well. I'm not going to do a 14 to 16 hour day and then get on the Internet and post that I have fish for sale. We might try a little bit of it with crab, but I’m just going to wait it out and hopefully there will be restaurants again in the next year or two.”

Well-Being, Social/Political

8. Labor/New Participants Overall, how would you rate your port in terms of being able to recruit new entrants to the industry and being able to retain current participants?



Discussion Summary Participants indicated recruitment and retention of participants is difficult, especially for crew.

- One participant shared how the fleet’s demographics have tended to shift toward the younger generation of fishermen as more people are approaching retirement age. However, one participant stated it is difficult for people to start out in the fishing industry because of the increasing costs to fish, including increased costs of fishing permits, and the need to travel further from port.
- Another participant explained fishermen cannot keep crew employed full-time because living in the Bay Area is expensive. When fishermen find good crew, they will often leave and end up

buying into the fishery, while those that are not great crew members will typically leave for another industry like construction.

- One fisherman shared it has been hard for them to find good, competent crew members. Another fisherman added it is also difficult to recruit crew members because there is not enough money in the job.
- Another participant reported fishermen need to provide steady work for their crew or they are not able to retain them in the off-season.
- One fisherman reflected on how they have cultivated long-term relationships with their crew and have had the same people for the last ten years.
- Several participants explained people often have a romantic view of the job but then they realize a lot of work and preparation goes into getting ready for the fishing season with little to no pay.

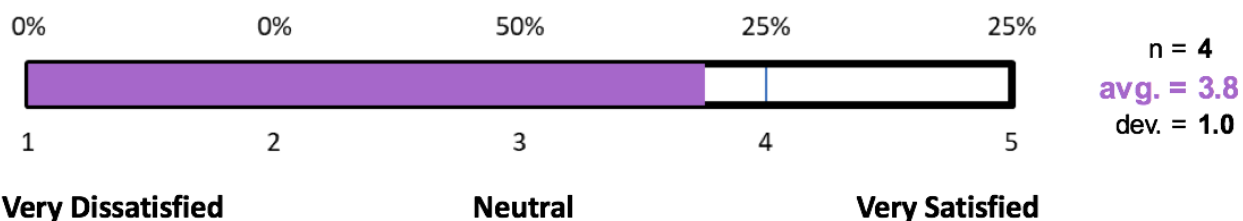
Participant Quotes

“There really isn't much left for the young fishermen to just come in and start fishing for something. You have to buy a permit. You have to travel. The industry is turning into traveling. If you want to fish salmon, you better fish the whole season and you better travel. You can't just fish right out in front of where you live [. . .] they can't fish out of their port, and crab is turning into the same thing. You better travel if you want to make it. So the small [few] that stayed home, even with permits, are starting to go away.”

“It's expensive to live here [in the Bay Area]. It's [fishing] at best a part time job. Most of the time, because there are such different fisheries, you can't keep somebody employed all the time. And that makes it difficult to keep people. If you do get someone good, they end up buying their own boat or getting into the industry. If you end up with someone bad, they don't last. They either leave to get a full-time job doing construction or something else. Just not enough money in it in the crew aspect.”

“Crew is probably one of the most difficult aspects of owning a boat. I've had literally hundreds of crew in my career [. . .] A lot of people think they want to go fishing and they have this kind of romantic image of it and they watch America's Deadliest Catch and they get inspired. But what can often happen is there's a lot of preparation to get ready for the crab season. There's a month of work to do in the shed, which typically there's no pay for the crew. It's part of their job to get the traps ready and get the boat ready for the fisheries. And they get out there on the first day and realize they've made a terrible mistake. And that's happened to me so many times.”

9. Job Satisfaction Overall, how satisfied do you think fishermen from the port are with their jobs in the fishing industry?



Discussion Summary Several participants indicated being a fisherman brings them a sense of fulfillment and pride, but given the nature of the job, satisfaction is also related to whether fishermen are able to be successful and support a living from fishing.

- One participant mentioned fishermen who are willing and able to put effort into fishing are more satisfied with their jobs.
- Another participant explained dissatisfaction as a fisherman is often related to factors such as the need to take on a second job, a fishery's management, and weather conditions.

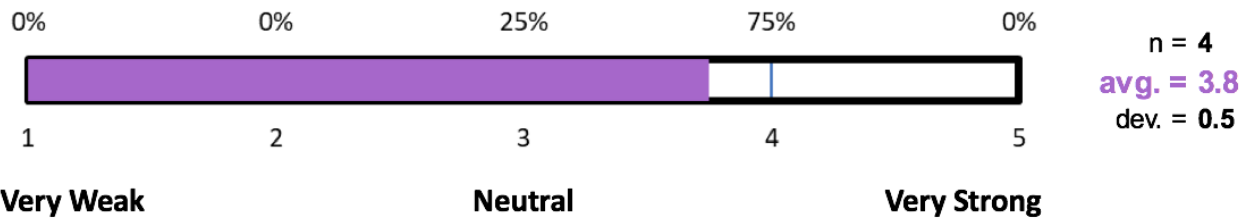
Participant Quotes

“The thing that drew me to wanting to be a fisherman when I was a kid was I would go down to the wharf and I'd see the old fishermen, and they were too old to go out anymore - their families wouldn't let them go on the boat - but they still came down to the wharf every single morning at five in the morning to have coffee and hang out and stuff, and so I thought, ‘wow, that must be a great job,’ you know, they just want to keep doing it for their whole lives. And the other fishermen, [. . .] I can't imagine them wanting to do any other job. I'd say they're extremely satisfied because there's as much complexity to making a living fishing as any human being could ask for. People take great pride in their boats and the competitive aspect of fishing and all that. Once they figure out that they can do it and be successful most of the time, it seems like they want to do it their whole lives.”

“Fishing isn't like any other job. You're not on the time clock. It's always a 20 hour day. But if you love doing it and love being on the ocean, handling the fish and doing boat work and stuff, it's the most satisfying job you could imagine. As long as you can make a living out of the money because that's part of the enjoyment of it is catching a lot of fish and making a big pile of money very quickly, which you can't do in other jobs.”

“I'm looking at a lot of guys that are in the industry with me and a lot of them are dissatisfied. They have multiple jobs because they don't feel satisfied that they can have success [. . .] But The sense of job security? Are you kidding? That's not going to happen. The level of stress? Oh yeah, there's a lot of stress. [. . .] But then all of a sudden you get one of those days when it's flat, calm, no wind, and the fish are biting like crazy and you're loading up. And you wouldn't be anywhere in the world to have another job for any reason. [. . .] Even the worst day fishing is the best day doing anything else. But that's when you're successful with doing it and you have the patience, you have the endurance to keep on doing this. [. . .] If you're a fisherman and successful, you're not doing anything else. That's it. It's in your blood. You're not going to go be a carpenter. You're not going to go be a plumber. If you did that, your mind would still be out on the water.”

10. Social Relationships - Internal Overall, how would you rate the strength of social relationships (or social capital) within your port?



Discussion Summary Participants reported social relationships among fishermen in the San Francisco area are strong.

- One participant stated there is leadership and organization within the San Francisco Crab Boat Owners Association.
- Another participant described the culture at the wharf. There is a sense of trust and understanding among fishermen and they look out for each other on the water.
- One participant shared that they have great respect for the fishermen at the wharf who work to support the fisheries, especially those that engage in market price negotiations.

Participant Quotes

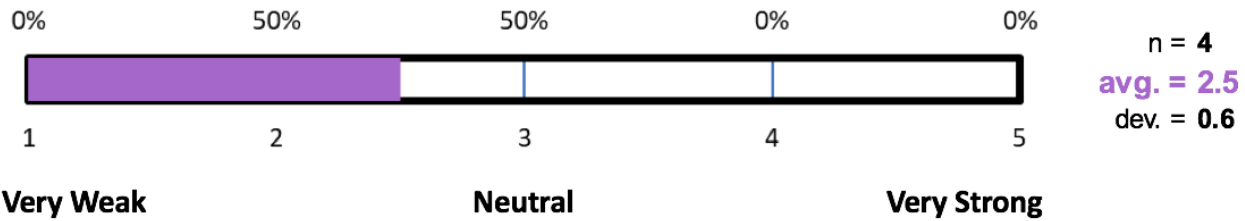
“A good example [is the Crab Boat Owners Association. They’re] doing a great job, working really hard and we appreciate it. I'd say there's pretty good cohesion at the wharf. We have meetings and there's always talk.”

“The wharf is kind of like a small subculture, it has its own sort of rules and codes of conduct.”

“Some of my best friends are down here, the people that would come and save you if you were sinking, and [. . .] some people you just don't share opinions with. And that's just the way it is. But a lot of the guys here, regardless, would come out and save you if you were sinking. They don't want to see you die.”

“I wanted to say one thing and this is to [name redacted] and your gang there [at the wharf]. [. . .] I respect you guys and your decisions and the Owners Association. [. . .] We appreciate all the work that you guys do, working with the markets and stuff to set up market structure for the crabs during the season when it opens. But we also respect everything that you guys do in the harbor. And that's one of the things that I wanted to put in here as far as social relationships among fishermen, fishermen that are working for the fisheries. We respect them. And I respect you very much. And I want to say thank you.”

11. Social Relationships - External Overall, how would you rate the strength of the port's relationship with external groups who could help support community needs?



Discussion Summary Participants believed relationships with groups outside of the fishing community need improvement.

- One participant stated how the commercial fishing industry is portrayed by various environmental non-governmental organizations (ENGOS) negatively affects how agencies and the public view fishermen and their activities. However, there are some NGOs that understand the importance of a strong fishing community.
- One participant shared that while fishermen are generally involved in state and federal processes (e.g., working groups, Pacific States Fisheries Management Council) and communicate with decision makers, they do not feel they are being heard as is evidenced by the lack of policies supporting the fishing community.
- Another participant encouraged people to learn more about the fishery and to engage more with fishermen. They added there used to be public events that educated the San Francisco community about fisheries that operate out of the port, which helped encourage positive public perceptions of the industry. Those events have diminished in recent years.

Participant Quotes

“As far as [external relationships] there could be some massive improvement in that because of the bad image that we receive from NGOs, but then there are some NGOs that are extremely helpful and understand how important it is to have a strong fishing community. In terms of the agencies, it's very hard to educate them about how important the commercial fishery is. I think they hear a lot of stuff from NGOs that don't like us and don't want to see us fishing, or want us to fish in the manner that they approve of which would mean that we would all go out of business, so that's all problematic.”

“On the NGO front, you've got to separate environmental NGOs that are trying to shut fisheries down or trying to curtail certain types of fisheries versus non-profit organizations, because some of the organizations we work through are NGOs and those NGOs we have constant contact with, and they are fishing representative NGOs. So we do deal with non-profit organizations. We are in contact with the [California Department of] Fish and Wildlife, [name redacted] is on the Whale Advisory Group. So as far as communicating with the Fish and Wildlife, with politicians in Sacramento, we are doing that. We aren't getting the results we want.”

“I always thought that people should know more about the wharf and the fishermen there and the culture there. I think it used to be like that, they used to have parades and just a lot of community involvement down there, which has kind of gone away. So I'd like to see more of

that to counter the disinformation that the public is getting from the NGOs and the media. That's kind of our biggest problem."

Well-Being, Overall/Additional Comments

12. Overall/Open-ended *Is there anything not captured above that you would like managers and other readers to know about your fishing community/industry?*

- *What do you think federal and state managers could do to better support California's fishing communities?*
- *What do you think members of your fishing industry could do to support the well-being or sustainability of your fishing community?*

Discussion Summary Participants offered suggestions for how managers and fishermen could help to support their fishing community and the commercial fishing industry.

- Participants asked that managers more actively engage with fishermen and give the fishing community's insights and feedback as much weight as they do scientists' and NGOs' in their decision-making. Fishermen would be more inclined to communicate with managers if there were meaningful relationships built on trust between fishermen and managers.
- One participant emphasized the need for fisheries managers to understand the importance of the commercial fishery and how current management is a threat to the seafood supply and jobs in the fishing industry.
- Another participant communicated fishermen would like to know more about policy initiatives like Assembly Bill (AB) 3030, including what it would mean for fishermen and whether it would consider existing MPAs and other areas closed to fishing.
- Participants encouraged other fishermen, especially younger fishermen, to get involved in the policy processes that affect their fisheries and highlighted the need for unity among the fishing community when engaging with NGOs and others. Even though it may seem daunting to get involved, what matters is that the fishing community is working together toward a common goal.

Participant Quotes

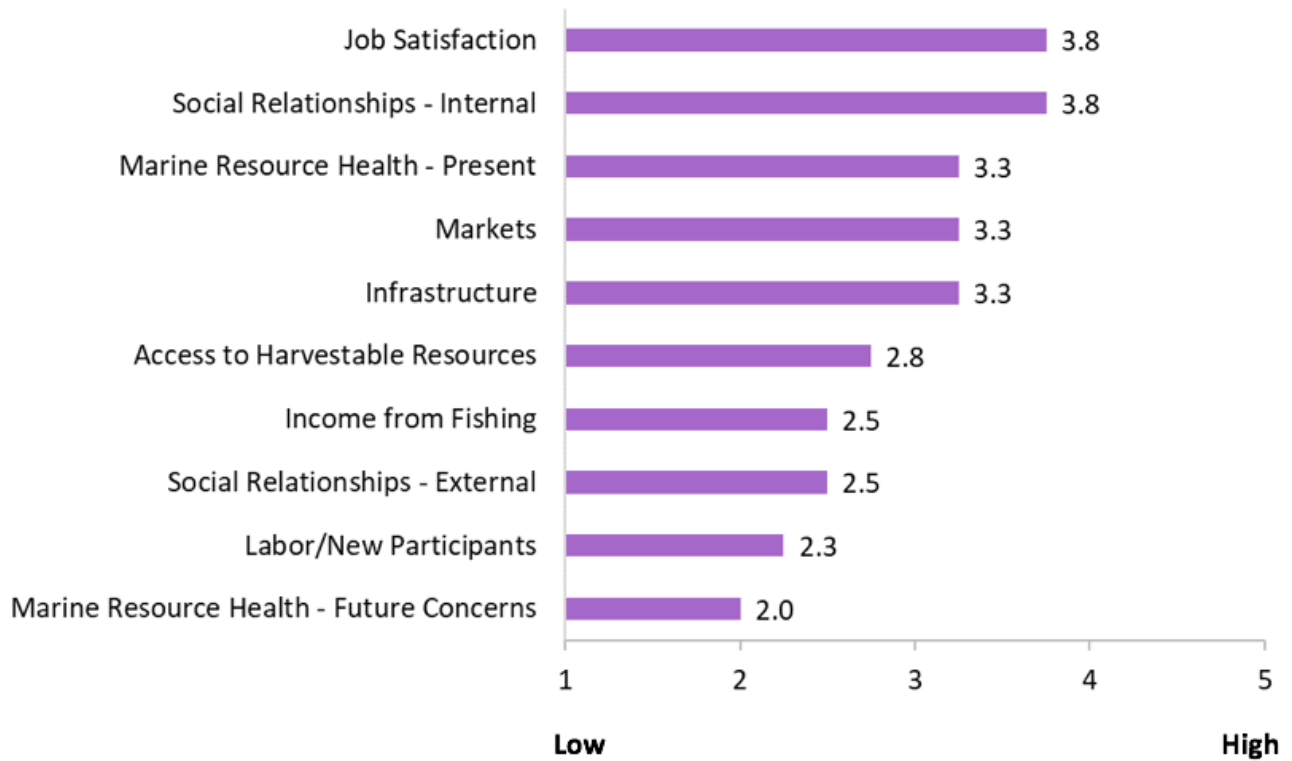
"As far as fisheries management and fisheries managers and those that are in that position, come down and talk to us [. . .] listen to us. We're in the field here. We're not looking at a book or some statistics. We're here every day out there. We know what's going on. If you want to do adaptive management especially, come to us, ask us what's going on and get the latest information. We'll tell you if we can trust you, that's important to build. So build that trust. Build that trust where we can communicate."

"The agencies and the politics and the legislature - I do feel like they don't fully understand the importance of the commercial fishing industry to the state of California and the people, not just those that fish for a living, but all the jobs and the infrastructure that's dependent on people producing fish and the people who want to eat fish. I think you're not getting the message that this heavy-handed approach to management is gutting our industry and there's going to come a time when we're not going to be there to supply them with seafood."

“To the fishermen, I'd say try and look at the overall health of the entire fishing community and not just your own personal business plan. There's lots of conflict between big boats/little boats, north/south boats, boats that travel/boats that stay in their port or fish out of it in front of their home. But when you start throwing other commercial fishing user groups under the bus, you end up throwing your own self under the bus in the end, and I've seen this time and time again because without unity, the people that want to see us disappear are going to succeed because they'll play us against each other. And that's a huge danger.”

Perceptions of Fishing Community Well-being, Average Responses for Questions 1-6, 8-11

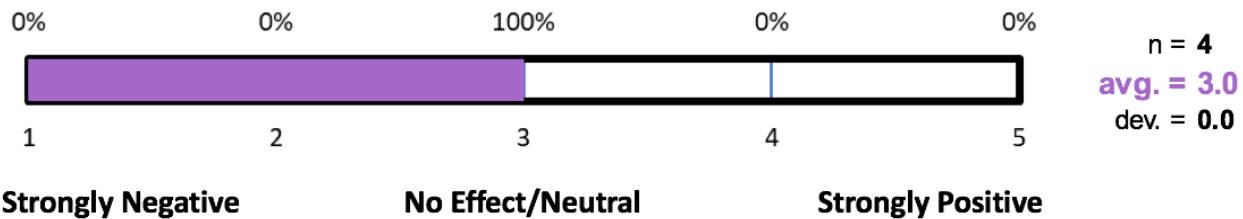
(Note: The following figure does not include the average rating for question 7. COVID-19 Impacts.)



Perceptions of MPAs

MPAs, Outcomes/Effects

13. MPA Ecological Outcomes Overall, how would you rate the effect that the California MPA network has had on marine resource health in your area?



Discussion Summary Participants reported they have not seen any effects on resource health, positive or negative, related to the MPAs with regard to abundance, diversity, size, habitat, or market quality. They emphasized the MPAs only affect where fishing can occur but do not control for any other factors that affect fisheries (e.g., quotas, pollution).

- One participant stated this is a difficult question to answer because they would need to see the results of MPA monitoring studies to assess MPA impacts on resource health.
- Another participant believed fishing activity was not negatively affecting marine resources in areas that were eventually designated as MPAs, so by closing areas to fishing activity, the MPAs did not have an effect on resource health.
- One fisherman noted MPAs are one of several factors, including quotas or rockfish conservation areas (RCAs), that could affect marine ecological health. They believed that if there is any evidence of improved health, people will attribute it exclusively to the MPAs regardless of the cause.
- Another fisherman knew of MPAs that had a negative impact on marine resource health. Specifically, in the Bodega Bay area there are sea urchin barrens because of the restrictions on sea urchin harvesting.

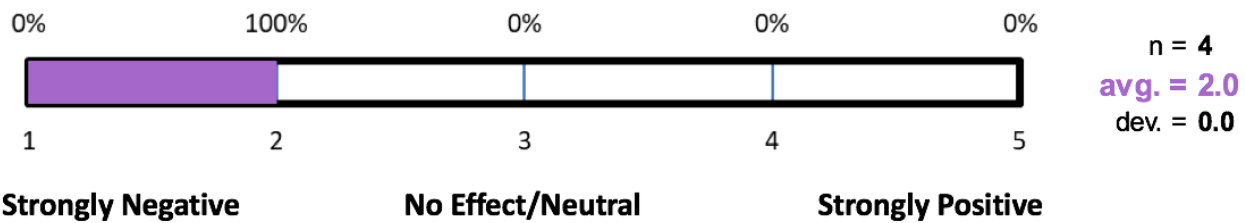
Participant Quotes

“You couldn't say, ‘OK, the closure at Point Reyes made a difference in my catch down here.’ You can't say that. I mean, this kind of question, you would have to have studies done to qualify this. So as far as saying whether it's had an effect, I agree with everyone else. Obviously, it's no effect or neutral. You have no way to quantify it. [. . .] There is no way I could say with my view of what I catch and what I fish for, what I have seen with my own eyes, fishing next to MPAs, that there's any difference.”

“I'd say it's neutral because the MPAs were focused on stopping fishing in those areas. That was the whole point of it, to keep us from fishing in these areas, but we weren't doing any harm in those areas to begin with. [. . .] I don't see any positive effect whatsoever of the MPAs on abundance of fish. Talking about the spillover effect, I think that's all false. [. . .] I'd say there's no positive outcome from the MPAs in terms of the fishing industry.”

“I think it's hard to really assess for a number of reasons, and one is there's more than just MPAs. There's restricted quotas that [. . .] I think probably keep people from fishing any area more than it being an MPA. And then there's the RCAs. And so I think probably what will happen is that whoever decided this [the MPA network] is a good idea will take credit for it working, even though it probably isn't really possible to tell whether it really made any difference or not.”

14a. MPA Livelihood Outcomes Overall, how would you rate the effect that the MPA network has had on the ability for fishermen from your port to earn a living/gain income from fishing?



Discussion Summary Please see the **Discussion Summary** following question 14b. *MPA Effects - Overall* which summarizes the conversations related to questions 14a and 14b.

14b. MPA Effects - Overall What other types of effects or impacts have fishermen from your port experienced from MPA implementation?

Discussion Summary Participants reported MPA impacts on livelihood outcomes vary across fisheries but believed the area from Point Reyes to Point Arena was disproportionately affected overall because there were historically valuable fishing grounds in that area.

- One participant stated the rockfish, sea urchin, and kelp fisheries were heavily negatively affected by closures that were placed in once productive fishing grounds.
- Another participant explained the MPAs have resulted in fishing effort being concentrated outside the MPAs because fishermen are trying to fish close to their traditional fishing grounds. Additionally, scientists have theorized that fish populations will increase in abundance inside the MPAs, leading to increases in abundance along the MPA boundaries. However, they explained that fishermen have yet to see this spillover effect.

Participant Quotes

“They're [the MPAs] areas you can't fish to earn. So it does cut out some of the ability to earn. Some fisheries are very, very slightly impacted and others are greatly impacted.”

“There's this [. . .] aspect of people trying to fish around the edges of these MPAs and when you take away fishing grounds and people focus on whatever's available, they put more pressure on those areas.”

“Shift of effort [has occurred] as well, where the effort shifts to the boundary. And [. . .] because of the fact that you're drawing from a certain geography and as the geography is limited, it's theorized that over time that abundance increases in those closed areas. And your success [increases] closer to that line where there's greater abundance and your catch is going to be higher. So everybody wants to stay in close [to the MPAs].”

MPAs, Discussion of Specific MPAs

15. MPA Effects - MPA Specific Which MPAs have had the most impact (positive or negative) on fishermen from your port and why?

Discussion Summary Of the MPAs that participants identified, most have had a negative impact on fishermen.

- *Point Reyes State Marine Reserve (SMR) and State Marine Conservation Area (SMCA):* Several participants stated the Point Reyes SMR was among the best fishing grounds for halibut in the area and has resulted in notable income losses for halibut fishermen. One participant explained there has been a build up of crab gear along the Point Reyes SMCA, increasing the risk of whale entanglements near this MPA. Another participant noted this SMCA only allows for salmon fishing.
 - One participant questioned the reasoning behind the designation of these two MPAs since they cover mostly sandy bottoms. They suggested the MPAs were chosen without any particular conservation goals in mind. Another participant believed they were designated as MPAs to produce habitat replication and connectivity with other MPAs in the network.
- *Montara SMR:* One participant shared how they have seen large crabs moving out of this MPA.
- *North Farallon Islands SMR, Southeast Farallon Island SMCA and Special Closure:* Several participants noted these MPAs encompass once productive rockfish fishing grounds. They believe the areas directly outside these MPAs experience increased fishing pressure and concentrations of fishing effort as a result of these MPAs. Because of these MPAs, fishing pressure cannot be more spread out.
 - One participant commented the North Farallon Islands SMR should have been designated as an SMCA to allow for salmon fishing, and that the overall planning for these MPAs was not done collaboratively.
- *Duxbury Reef SMCA:* One participant shared that because they can still rockfish here, this MPA did not have adverse impacts.
- *Reading Rock SMR and SMCA:* One participant shared how these MPAs affect Dungeness crab fishing because fishermen must travel farther to fish around these areas.

Participant Quotes

“You can't [Dungeness] crab and you can't fish for halibut [in the Point Reyes SMR or SMCA] so that just seems kind of pointless because neither of those [species] really needed to be protected. Some of it seems kind of misguided. And it's all sand bottom, so they just just picked an area to just have an area to protect.”

“We lost some of our greatest halibut grounds at the Point Reyes SMR. That was an impact for us and we didn't like it. And in past years, we've lost measurable income for that in that particular geography.”

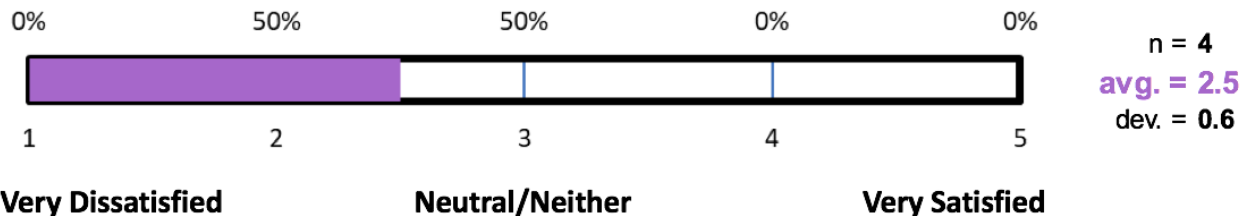
“The Point Reyes [SMCA] - that's a real productive [Dungeness] crab area, but then because suddenly they've created this boundary line, everybody wants to have the inside lay on that

boundary line so boats are piled up here on top of each other. And it creates a severe hazard for whales moving in and out of Drake's Bay because suddenly there's this unusually high number of traps, all in one specific area, which is very hazardous in terms of whale entanglement.”

“[The North Farallon Islands SMR and Southeast Farallon Island SMCA and Special Closure] took away significant areas for rockfish fishing which I consider is negative because with any kind of fishing, you don't go to the same spots over and over again, you need to spread the effort out. So when you take areas away, it impacts the areas that are open in a negative way. [. . .] It just would be better if everything was open and you can pick and choose the area where you want to go each time.”

MPAs, Management

16. MPA Management Overall, how satisfied do you think fishermen from your port are with the management of the MPA network?



Discussion Summary Participants expressed their dissatisfaction with the MPA implementation process and current MPA management.

- Several participants were involved in the regional stakeholder group for the North Central Coast region and shared their experience and perspectives on the MPA implementation process. One participant believed the process was disingenuous and driven by the values of the funders. They thought fishermen were involved only as a box-checking exercise and, as a result, their perspectives were not seriously considered. Many of the initial proposed closures highlighted that those involved in designing the MPA network did not understand the safety issues for fishermen (e.g., not allowing anchoring in the MPAs since many offer reprieve from inclement weather).
 - One participant shared the belief that fishermen were asked to join MPA designation discussions to disclose where they fished so those areas could be designated MPAs.
 - Another participant believed MPA locations were more heavily weighted toward rockfish habitats rather than a diversity of species and habitats.
 - One participant noted that while the goal of the MPAs was ‘protection,’ MPAs only protect against fishing and not other impacts (e.g., oil spills, changes in ocean conditions).
- One participant stated there should be better communication of information and decisions related to the MPA network and more opportunities for fishermen involvement in MPA management and decision making. One fisherman shared they had not heard of information related to the MPA network or MPA management since the MPA designation process until they were invited to participate in this focus group.

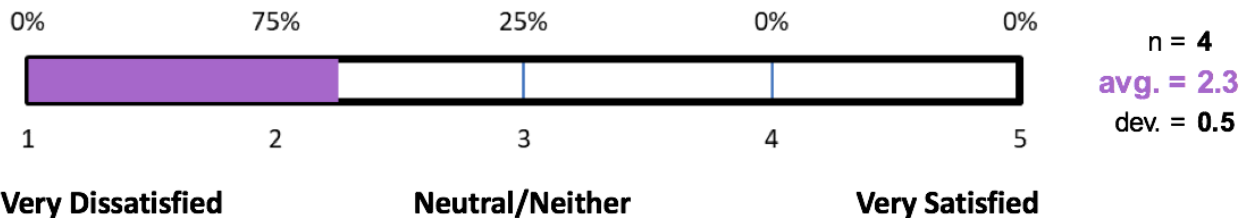
Participant Quotes

“That's why the fishermen were there - to find out where you fished and then that was going to be the target [for MPAs].”

“What are they protecting? What about an oil spill? Is that [the MPA network] going to protect against an oil spill? No, obviously not. But these people said that protected means protected against everything, even things that you can't protect against like weather and ocean conditions. There are things that you don't protect them [marine resources] from. So basically it's focused on fishing, period. And is that valid? No.”

“Fairness? What's fair? To who? [. . .] I don't see enough communication of information and decisions; I think that can be improved. Opportunities for fishermen involvement - I think that those need to be brought to the fishermen. Like I was saying earlier, communication with departments would be a beneficial aspect for all parties.”

17. MPA Monitoring Overall, how satisfied do you think fishermen from your port are with the monitoring of the MPA network?



Discussion Summary Participants shared their dissatisfaction with MPA monitoring, stating there has been poor communication of results from past and ongoing research.

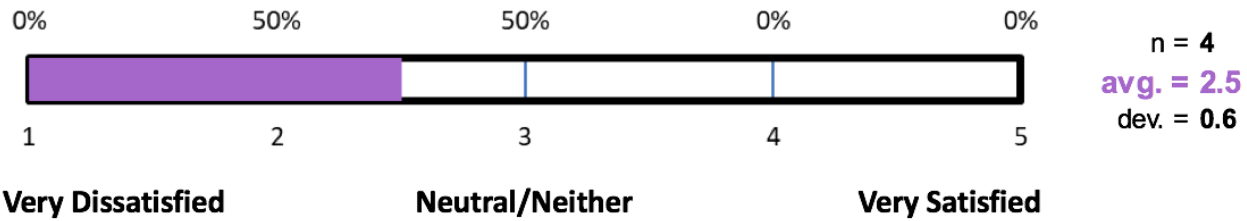
- One participant explained it was unclear if there has been any work to determine if MPAs are meeting their identified goals.
- Another participant suggested that fishermen be more involved in monitoring efforts.

Participant Quotes

“I haven't heard anything about monitoring or any sort of scientific study to see if [the MPAs are] even worth having. If they're not accomplishing anything, why bother? Why not just open everything back up again? I'd obviously like to see that happen.”

“How satisfied do you think fishermen are with monitoring? No one knows because the communication is not there. So you want to have collaboration with fishermen? I go back to what I said before, build that trust, talk to the fishermen, get the fishermen involved in this more, and maybe it might work.”

18. MPA Enforcement Overall, how satisfied do you think fishermen from your port are with the enforcement of MPAs?



Discussion Summary Participants were generally dissatisfied with the clarity of MPA regulations and the fairness of enforcement.

- Several participants stated managers assume all fishermen have access to or know where the MPA boundaries are but that is not the case, especially at the time of MPA designation, since not all fishermen have a GPS. For those that do, the MPAs are not marked on all GPS software.
- One participant indicated the rules and regulations are unfair because fishermen are penalized for gear that drifts over MPA boundaries due to factors that are out of their control (e.g., currents). However, there are still some people who are willing to fish right along an MPA boundary or take the risk of fishing inside an MPA because the rewards are high compared to the risk of enforcement.
- Another participant shared there has traditionally been a lack of funding for enforcement above Point Reyes.
- One fisherman believed they should be able to fish in California waters without MPAs, which negatively affect their ability to earn a living from fishing.

Participant Quotes

“We had a problem with figuring out how to determine where these [MPA] boundaries are. [. . .] Obviously, the only way you could do it is with the software in your computer. Did everybody have software in their computers? Not all the time. At the time, no, not all boats did. [. . .] And so they're assuming that everyone has a GPS and has that software and is able to take it and recognize where these boundaries are.”

“One of the hazards to fishing on a boundary line is every time you pull your trap, depending on which way the current or the wind is going, your trap walks. It moves a certain distance, up or down, so people are pulling and setting their traps back, and their traps end up over the boundary line.”

“I can see enforcement problems above Point Reyes, in those areas, getting boats from the Fish and [Wildlife] Department. The funding to be able to do the enforcement up there was difficult and still is.”

“Personally, I think that I should be able to fish legally in the state of California and make a living, and if I can't, then something's very, very wrong with the whole setup.”

19. MPA Overall *Any additional comments or concerns about the MPAs and MPA management you would like to communicate?*

Discussion Summary Participants shared several concerns about the MPAs with regard to current management, the MPA implementation process, and the future of the closures.

- One participant stated more needs to be done to justify the existence of the MPAs because they are expensive to enforce and maintain. Additionally, they cause large, negative impacts on fishermen.
- Another participant believed there should be fewer discussions about increasing closed areas until the current ones can be effectively managed. One participant highlighted MPAs cover some of the most productive fishing grounds, and that with the proposal to create more closures through AB 3030, there would be very little area accessible to fishing.
- Another participant reiterated that involving fishermen in MPA monitoring and communicating with the fishing community about the effectiveness of MPAs, including their shortfalls, is important.
- One participant expressed support for preventing heavy boat traffic in biologically important areas (e.g., around the Southeast Farallon Islands), but fishing has less of an effect on seabirds and other marine life compared to activity from larger vessels.
- Another participant recounted how the MPAs were justified because of the collapses in rockfish populations as a result of mismanagement where trawlers, gillnets, and large fishing fleets decimated the resource. Since these are not as much of a concern today, the closures should be reconsidered.
- One participant shared the belief that the MPAs ended up larger than they should have been but that their size was needed to satisfy special interest groups involved in the MPA planning process.
- One participant emphasized closing an area without the prospect of reopening it in the future once the resource has improved is improper fisheries management. They highlighted the example of how RCAs were opened to fishing because the health of the species was doing better.

Participant Quotes

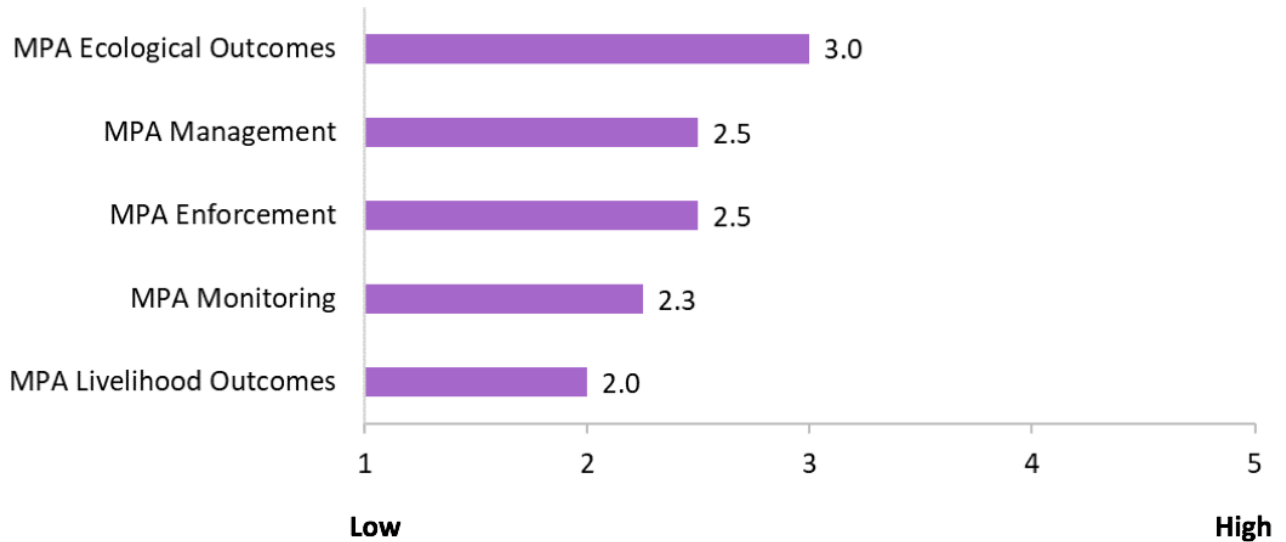
“There seem to be more reasons that [the MPAs] cause damage than they do good, so unless [managers] can make a better case for their existence, even the ones that we have currently, how can there be conversations about increasing them, like what they’re saying about the 30 percent [AB 3030]? That just seems like insanity. It's death by a thousand cuts.”

“Communicate with us [fishermen], show us what [the MPAs are] doing, [. . .] involve us in the monitoring and let us know what's going on.”

“I think it's hard to really put your finger on [whether the MPAs are working]. Obviously, rockfish populations have increased, but it's hard to really give the credit to one thing [like MPAs]. But like I said, if they're working, don't increase them and take away any possibility for fishing. And [if] the state doesn't think they're working, then the solution is to get rid of them, not to increase them. So in either case, increasing them doesn't seem like it's necessary or really the right direction to go.”

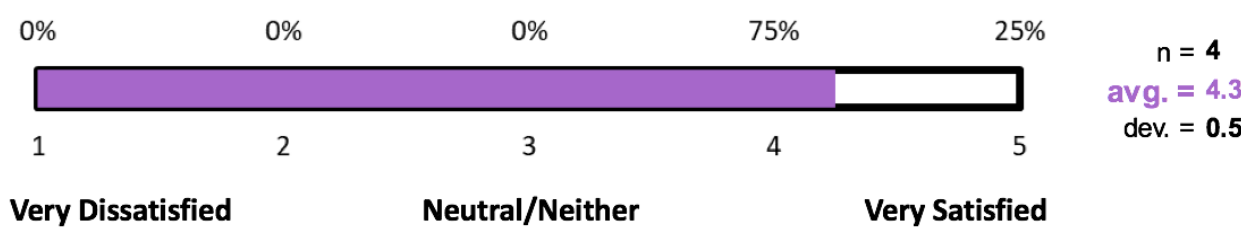
“MPAs are not fishery management because they're not going to reopen. Fisheries management was that depth that they shut down for rockfish [through RCAs]. And then when the rockfish did better, they opened it up to deeper waters. That's the management process. This isn't fisheries management - [it's like] shutting down highways because you don't want to monitor speeding or accidents and just closing them down.”

Perceptions of MPAs, Average Responses for Questions 13-14a, 16-18



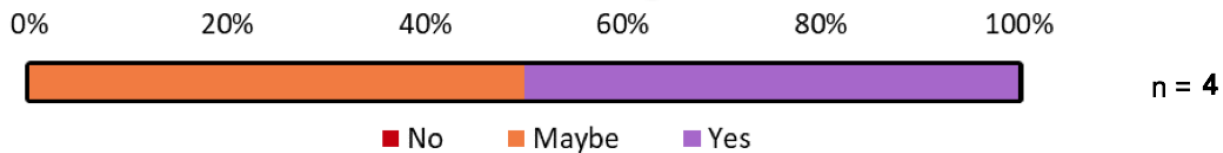
Feedback on Virtual Process

20a. Satisfaction with the Virtual Process Overall, how satisfied were you with your experience participating in this virtual focus group?



20b. Willingness to Participate in Virtual Process in Future *Would you be open to participating in a virtual focus group or meeting like this in the future?*

(Note: For the following figure, the length of the orange bar indicates the percent of participants who responded 'Maybe' to question 20b. The purple bar indicates the remaining percent of participants who responded 'Yes.' If participants responded 'No,' a red bar would appear.)



20c. Process Open-ended *Can you share any additional comments about your experience in this virtual focus group? What do you think are some of the pros and cons of having a conversation like this online rather than in-person?*

Discussion Summary Participants appreciated the opportunity to be involved in this discussion and believed it was a step toward better communication with fishermen.

- One participant stated they were satisfied with the process and that they were open to participating in similar meetings in the future.

Participant Quotes

“I appreciate you listening and giving us the opportunity to weigh in on these important matters, and I think you guys did a great job. In the future, hit me up.”

“I was very satisfied. Thank you very much for putting this all together and giving us [this space to share] input. Communication, as I keep stressing, is most important. And you have the ear of certain people that are going to be able to listen to you. Yes, I definitely appreciate what you guys have done, opening up potential avenues of communication. We'll see what happens. You can count on me to be here whenever I can.”