

# **SOUTH ATLANTIC FISHERY MANAGEMENT COUNCIL**

## **SNAPPER GROUPER ADVISORY PANEL**

### **Webinar**

**November 4-6, 2020**

### **TRANSCRIPT**

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Jack Cox  
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Other observers and participants attached.

The Snapper Grouper Advisory Panel of the South Atlantic Fishery Management Council convened via webinar on November 4, 2020 and was called to order by Chairman Jimmy Hull.

MR. HULL: I want to welcome everybody to this Snapper Grouper AP meeting. As you've seen, we have a full agenda to go through and cover, and I ask that everyone give it their full attention and be concise in your comments, so we can get through everything. The council staff has done an outstanding job preparing the agenda, and the council has asked for specific input from us on many of these topics, and so I think, Myra, would this be a good time to invite public comment?

MS. BROUWER: We probably should approve the agenda, and the minutes are not yet available, and, yes, maybe we can do public comment and then allow Jessica to address the AP.

MR. HULL: Okay. Let's move with the approval of the agenda. If there's no objection to the agenda, then it will be approved. Is there any objections to the agenda as provided? I don't see anything, and so the agenda is approved. At this time, I would like to provide an opportunity for public comment from other than AP members, if there anyone attending that would like to provide comment. You can raise your hand or unmute yourself and speak. I don't see anything, Myra.

MS. BROUWER: I don't either, Jimmy. If you don't mind, I wanted to just point out that we did receive a comment on the online form for the AP, and that was a comment submitted by Chris McCaffity, and, as you all know, the link to that form is on the website, and there's a place where you can submit comments and read the public comments, and so I would invite you to do that at some point, but just know that that's there.

MR. HULL: Right on. Thank you for that. I would like to remind the AP members that you raise your hand, and you will be seen in the order that you raise your hands. Also, when we do get to motions, the motions are going to be approved by consensus, and so, when we have these motions down the road, if you have opposition to the motion, then you need to raise your hand. If not, then these motions are going to be approved by consensus. At that point, I believe it's back to you, Myra.

MS. BROUWER: Thanks, Jimmy, and I was going to pull up a very quick update from Jessica McCawley, the Snapper Grouper Committee Chair, who is going to address the AP briefly.

MS. MCCAWLEY: Thank you, Myra, and thank you, Jimmy. I just have a couple of slides here for folks. I am going to try to be here for the whole meeting, and I might have to step in and out, and so, if you guys have questions throughout the week, I can certainly try to answer it, and I think there might be a couple other council members on the line, like Chris maybe, and he can answer things as well.

Just some items that the AP had been asking about, and I wanted to give you guys a couple of updates, and so the council saw some information about the status of the commercial electronic logbook, and I know that's really important to you guys. We got this update in September, and no real target completion date was given, and so I just feel like we don't have a lot of additional information at this point, unfortunately.

Also, the private recreational permit and reporting amendment, also known as Amendment 46, this has been an amendment that you guys have been asking about for a long time, and it was one of

the amendments that the council worked on, and then it really hadn't made it back to the top of the list for the prioritization, but, at the September council meeting, it was decided that there would be an all-day webinar, and this is scheduled for Monday, November 12, where we're going to talk about recreational items, and particularly dig down into this Amendment 46, and so I wanted to let you guys know, and I know you've been asking about it, and it is coming back.

The council has been doing some of these half-day or all-day webinars, so that we can get a lot of additional background information that we usually don't have time for during regular council meeting weeks, and so we're excited to talk about this, and I know it was something that was important to you guys.

Thirdly, the modification of the shallow-water grouper closure, and I believe that you guys have talked about this in the past, and this might come up when the council discusses the results of the gag grouper stock assessment, and I know you guys were also recommending a ten-year review of this closure, and so this might be coming on the horizon.

You guys had also asked about additional information on discard mortality of triggerfish, and this has been delayed, due to the pandemic, and then so all three of these items have been delayed from the pandemic as well, and so updates from the Southeast Reef Fish Survey, artificial reef project updates, and this is about -- Particularly, guys were asking about the performance of reefs off of South Carolina and then obtaining a refresher on feedback obtained during the 2014 visioning port meetings, and I would say that all of these have been delayed because of the pandemic. MARMAP is not running, and there's a lot of other things that are happening. There's some things happening with MRIP and other studies because of where we are with the virus, and so I just wanted to give you guys this short PowerPoint that Myra had made.

I will be here all week to try to answer questions, and I'm really looking forward to the discussion. Thank you, guys, so much for taking time out to talk about these issues that are really important for the council, and we really appreciate your input. Thank you, Jimmy, and thank you, Myra.

MS. BROUWER: Thanks, Jessica.

MR. HULL: Okay. Thank you for that, Jessica. That was very informative, and I appreciate that, and I'm glad that you're here online with us. It looks like we're going to move right into the update on recent regulations and amendments.

MS. BROUWER: Looks good. Thank you, Jimmy. This is something that we try to do at every AP meeting. We try not to take too much time, but give everybody an update on where we are on recent amendments that have been submitted to the National Marine Fisheries Service for review and approval and things that are in the works, and so I just want to give everybody an update, and we know we have several new AP members, and we're just making sure that everybody is up-to-speed on what the council has been doing.

The first one is the red snapper amendment, the modification to the recreational season, and so this got started back in March of 2019, and the council began talking about perhaps modifying the days of the week that were open to red snapper recreational harvest, starting in 2020, to maximize fishing opportunity, and they also talked about maybe changing the start date of the recreational

harvest, the recreational season, and the commercial season, and removing that minimum number of days for a season to take place.

Before this amendment was developed, there was a threshold that, if the National Marine Fisheries Service determined that the season was three days or less, then there would not be a recreational season, and so the council held public hearings in August of 2019, and then, in September, they reviewed those comments, and then they chose to only go forward with an action to remove that minimum number of days, and, of course, that only affects the recreational sector.

The council approved the amendment in December of last year, and then, as you know, in the spring of 2020, we got word that the National Marine Fisheries Service had established that the season for this year was going to be four days, and so the amendment went through the rulemaking process, and it was finally approved, and a final rule was published on October 13. Theoretically, what this means is that, if next year, let's say, there is an indication that the season needs to be shortened, there could potentially be less than a three-day season for red snapper, and that is now allowed, any possibility.

The next amendment that I wanted to update you on is the one that designated artificial reefs as special management zones in the federal waters off of North and South Carolina, and this is Regulatory Amendment 34. This process to designate artificial reefs as SMZs was established in the original Snapper Grouper FMP in 1983, and the intent was to increase biological production and/or create fishing opportunities that would not otherwise exist.

In March of 2019, the North Carolina Division of Marine Fisheries and the South Carolina DNR submitted a request to the council to designate artificial reefs in the federal waters off of those two states as SMZs. The NC DMF requested designation of thirty artificial reefs as SMZs with a prohibition on the use of fishing gear other than handheld gear and requiring that the harvest of snapper grouper species with spearfishing gear be limited to the recreational bag limit.

South Carolina also requested designation of four additional artificial reefs, and there already were twenty-eight of them, I believe, prior, and so this was just adding four more, with the same existing restrictions on fishing gear as in other SMZs, which also limits angling activities to handheld gear and spearfishing, excluding powerheads, and it limits all harvest of snapper grouper species to the recreational bag limits.

We began developing the amendment in June of last year, and we had public scoping during the fall, and public hearings were held in May of this year, via webinar. In June, the council approved the amendment for formal review, and that was submitted to the National Marine Fisheries Service on August 11 of this year, and we're awaiting a proposed rule to be published for this amendment.

The next one on the list is the wreckfish ITQ program modernization, and this is being done through Amendment 48 to the Snapper Grouper FMP. Back in September of last year, the council reviewed the final review, the final version of the review of this program, which is an individual transferable quota program, the oldest in the country, I believe, and so there was this review that was conducted, and the council approved it and directed staff to begin developing an amendment to modernize this program.

The council also asked that the goals and objectives that were approved as part of the 2016 to 2020 vision blueprint for the snapper grouper fishery be included in the amendment, so that they can replace the objectives in the original fishery management plan.

In October, there was a meeting of the ITQ shareholders, and so the participants in this program, and wreckfish dealers, and that was held on October 26, and it was basically to just get feedback on how the program could be improved. In December, the council is going to discuss those recommendations, and the amendment may be approved for scoping, which would be held in the winter of 2021.

Next on the list is the for-hire electronic reporting amendment, and this is one that's been out there for quite a while, and the council began developing it in 2015 and submitted it for formal review in March of 2017, and, a year later, ish, on June 12 of 2018, the amendment was approved, but, because of the ongoing pandemic, the effective date of the regulations on the Atlantic side have been postponed to January 4, 2021. This amendment is going to require weekly electronic reporting for charter vessels that have federal for-hire permits for South Atlantic snapper grouper species, Atlantic coastal migratory pelagic species, or Atlantic dolphin and wahoo.

The reports from charter fishermen will be due by Tuesday following the end of each reporting week, which runs from Monday through Sunday, and headboat vessels with a federal for-hire permit will continue to submit those electronic reports to the Southeast Region Headboat Survey, but they will be also required to do that on Tuesday following the reporting week, rather than Sunday, which is currently the requirement.

Charter fishermen will be able to report using their computer, their smartphone, and tablets with access to the internet, and it's going to have to be through software that is approved by NOAA Fisheries, and this is going to be announced on their website when that information is available. We don't have that information yet.

What else? An owner or operator of a charter vessel or headboat that has been issued a permit for applicable fisheries in both the South Atlantic and the Gulf is going to have to submit a report under the Gulf's program, which is a little bit more stringent as far as requirements, when the Gulf's program is implemented.

Some of the approved software is going to satisfy reporting requirements for charter headboat vessels permitted in the Greater Atlantic Region and those with HMS permits, to avoid duplication. Then, lastly, I wanted to tell you that regulations in the Gulf of Mexico that are addressing the trip declaration and the electronic logbook components of the program are expected to be effective on January 5 of 2021, but the effective date of the location tracking component of the final rule hasn't yet been announced, and so we don't know what's going on there.

Then a couple of little updates here. The greater amberjack assessment, and this is Amendment 49, and so this is an amendment that's going to address the results of SEDAR 59, which is the stock assessment for greater amberjack that the council received in June of this year. The stock of greater amberjack in the South Atlantic was determined to be neither overfished nor undergoing overfishing, and so the amendment will probably consider modifications to the catch levels and sector allocations, to address the revisions to recreational estimates through the enhancement of the MRIP program, and then possibly management measures. The council is going to be talking

about this amendment in December of 2020 and giving us guidance for what they would like to see included, and so this will be coming back to you guys in the spring of next year.

Then there's yellowtail, and so the council is going to be receiving the results of the yellowtail snapper assessment, SEDAR 64, at their upcoming meeting in December, and they will talk about, at that time -- They may direct us to possibly begin an amendment to modify catch levels, allocations, and/or management measures for yellowtail at that time.

Then, finally, snowy grouper, the council will be receiving the results of SEDAR 36, which is an update to the stock assessment for snowy, and that's coming to the council in March of 2021, and so, again, this is something that will come back to you guys probably in the spring, and so I'm going to pause there and see if anybody has any questions.

MR. HULL: I don't see any hands raised, Myra.

MS. BROUWER: Okay. Well, good. I guess the next item on the agenda is red snapper. I will pull up the attachment that has the discussion questions for this fishery performance report. Many of you attended the September webinar and helped us put together the gag fishery performance report, which was just finished and sent out to the AP and the council and the analysts for the SEDAR assessment this week, and so this will be the same sort of exercise, and, Jimmy, I will pull up those questions on the screen, and then you can take it away.

MR. HULL: Thanks, Myra. You know, this is one of our important tasks, that we provide these fishery performance reports, and so we need to give this a really good effort, as we did on the gag, and I thought it came out really good, and so I'm going to --

MS. BROUWER: Sorry to interrupt, but I neglected to pull up the information that I would like to go through before the AP gets busy answering these questions, and so if you will let me pull up -- It looks like it's loading over here, and we may have to hide the raised hands for a minute, if that's okay with you, Jimmy, so we can display this information for everybody.

MR. HULL: Perfect.

MS. BROUWER: Okay. This is a little tool that council staff have been putting together, and this is the magic of Chip Collier and friends, and it's a really nice way to display information to not have you guys have to look at very lengthy papers with graphs and such, and so this interactive tool mainly includes information that we can gather on landings trends, life history, and a lot of it comes from the stock assessment, whatever previous stock assessment is out there.

For red snapper, here we have information going back to 2000, and so I will just kind of go through it quickly, so that you guys can get busy talking about your contribution and your observations for this species, and so the first tab here is just the life history, and so you've got your length-at-age curve. As you can see, red snapper can be different ages at a specific length. We have -- This is information from the latest stock assessment, as I said, I believe SEDAR 41, and so here's your length-weight relationship, with the whole weight in pounds on the Y-axis and the total length in inches on the X-axis and female maturity for red snapper. It looks like about 50 percent of female red snapper are going to be mature somewhere around here, maybe between twelve to fifteen inches.

This is information that came from the MARMAP surveys that have been conducted in the South Atlantic since the late 1990s, or the early 1990s, probably, showing you the trends in abundance, and this is independent of fisheries activity for red snapper. This is divided into the various indices that are used to inform the stock assessment.

Then we get into the landings, and so we've got commercial landings here, again going back to 2000, but we can toggle this little thing and maybe look at landings from 2010 forward, since that is when there was a moratorium on the harvest of red snapper, and so you can play around with this little bar at the top, but you can see the trend in commercial landings there, and this is overall landings in pounds whole weight by year.

Then it's broken down by state, and so you can see that Florida there is in that salmon color, and Georgia and South Carolina landings data were combined to maintain confidentiality, and North Carolina is in the blue. Then this figure here shows you the number of commercial releases of red snapper, and this is information that comes from the stock assessment, which had a terminal year of 2014, I believe, for that assessment, and so that's why the data are truncated there.

Staying with the commercial sector, we have it broken down by wave, and so you can see, obviously, there is no landings since 2010. In the early part of the year, the landings pick up, in the middle of the year, and, just for grins, let me put this back over here, so you can see the longer trend, and so this is going back to 2000 through 2018.

Other information that we have is economic values, and so, again, this is data looking at the whole time series, and so you've got ex-vessel value in dollars on the Y-axis by year, and then here's the adjusted price for red snapper. Again, dollars are on the Y-axis, year on the X, and, if you have any questions about these specific graphs, John Hadley, who is our economist on staff, will be able to answer those when I'm done going through this, and then, again, information here on economic impacts for the commercial sector, and you've got sales in dollars on the Y-axis by year, and then in terms of income by year and jobs by year. You can see, here, the years 2015 and 2016 is where there was no harvest allowed, and so that's why there's that dip there.

Moving on to recreational, I will quickly go over this. Again, this is the entire time series, and so landings are in pounds whole weight, and these are landings from the Marine Recreational Information Program, MRIP. Broken down by state, again, Florida is in that orange-coral color, and Georgia and South Carolina are in the green, and North Carolina -- You can sort of see it a little bit there in the blue. Then here's the number of released red snapper. Again, the data come from MRIP, and it does include the FES changes to the MRIP survey.

If you want to look at it by wave, here is that breakdown. Again, we can toggle this to 2010, so you can see what's been happening since then, and then we don't have economic information for the recreational sector, in terms of value in here and economic impacts for the recreational sector. This is income and jobs.

Then, finally, we have that information for both sectors combined, so you can look at landings for both of them at the same time. I'm going to pause there and see if there are any questions or if we can clarify anything. As I said, there are other staff online that can provide more detailed

information, if the AP would like to dig into some more of that before you get to your discussion questions, and so I will turn it over to you, Jimmy.

MR. HULL: Thank you, Myra. We'll give it another second and see if somebody does have a question on the information, and I do have one, to start with. Go ahead, Chris.

MR. MILITELLO: Can we look at the commercial jobs chart, and what jobs are we talking about? Is it just fishermen, or is it processors, or what is included in the jobs?

MS. BROUWER: I am going to look to John Hadley.

MR. HADLEY: That's a good question. The way that the NMFS economic impact model is broken out, you can look at harvester jobs, but that is a total job estimate, and so the idea is that's jobs in the economy, if you will, and so their model looks at the fish from harvester to consumer, and those estimates are at the consumer level, and so that would be considered the number of jobs supported in the economy. Certainly something to keep in mind is that that's just -- It's largely that model is based on the ex-vessel value, and so whatever you put in for the ex-vessel value is kind of what drives the outputs of that, and so it's just looking at -- Essentially, the input there is the ex-vessel value of red snapper, in general, and so that's why it tracks ex-vessel value very closely.

MR. MILITELLO: Okay. Thank you.

MR. HADLEY: Sure.

MR. HULL: Okay, and Rusty.

MR. HUDSON: One point of question. The fifty-one-year-old red snapper, is that the Atlantic side red snapper or the Gulf, because I thought we didn't have any as old as they had over there, and then, when I looked at that one graph that was the 2009 red snapper landings, it was like a third-of-a-million pounds, and then, of course, we closed everything down at the beginning of 2010, and it's almost like trying to compare an apple to an orange, and so we know that, in the previous years before the closure, we were seeing some very consistent red snapper fishing that we hadn't seen probably since the 1970s. Thank you.

MR. HULL: Thank you, Rusty. Randy McKinley.

MR. MCKINLEY: Looking at that graph, a fifteen-inch American red is only a little over a year old, and is that correct?

MS. BROUWER: I am displaying the information for total length-at-age, and this is, like I said earlier, the curve that came from SEDAR 41.

MR. MCKINLEY: That means they really, really grow fast, and I'm seeing a lot of like one-inch fish mixed in with the bass, and then we're seeing a lot of the small, under twelve-inch, fish mixed with the b-liners, and so it's pretty amazing, and so they're reproducing real quick right up our beaches then.



MR. HULL: Thank you for that comment, Randy. Bob Lorenz.

MR. LORENZ: Thank you, Jimmy. I have a question though that I would like to ask Myra, and where would be the proper place for us to start to learn or know, and maybe it's in a fishery management plan, and maybe I've seen it already, but I've forgotten, and, with respect to red snapper, we have all this nice data that keeps getting updated in something like a fishery performance report, but is it possible to produce something simple and include something simple with respect to where are we on status to -- When is it a recovered fishery? When is that?

What are the parameters, some very simple parameters, and where are we, or is there a way to get at least an estimate of where we are in the recovery on some critical parameters every year? I mean, it would be a wonderful thing to see, and I will bring an example. You have like the United Way, and we have a little thermometer that goes up on when you meet the goal for a certain amount of money, and is that possible for this fish particularly, and this fishery performance report, or am I off-base in asking for something like that?

MS. BROUWER: Bob, I'm not quite sure how to answer that question. That would be something very useful that I would like to see as well, but, I mean, it sounds like it's something that would involve a good bit of effort, and so I don't know that that's something that we, as council staff, would put together, and it would have to be a joint effort with the Southeast Fisheries Science Center.

What do we know we are putting together is a little bit more information on the management of red snapper on the South Atlantic, because people have all these questions that we as staff find ourselves repeatedly answering for folks, and so we're trying to consolidate and have like a frequently asked questions type of thing, where we can direct folks that have these specific questions on red snapper management or how the ACLs were arrived at and things like that.

MR. LORENZ: Okay, and so, in summary, I think it would be wonderful for us though, as an AP, to maybe -- I don't know if it's worthwhile for a small tutorial for us some time on what is the goal, what's the end goal of all this management. When will folks will be able to say, hey, we have a recovered red snapper fishery, and I would love to have a tutorial on that.

MS. BROUWER: Sure, and I see Chip Collier is on the line, and so perhaps he can offer some more comments on that, if that's okay with you, Jimmy.

MR. HULL: Perfect.

DR. COLLIER: Thanks for the question, Bob. It would be extremely difficult to get exactly where we are, as far as in the rebuilding plan. In order to calculate that, we would essentially need to update the stock assessment each year, and we just don't have the ability to do that right now in the South Atlantic Region. We are working on getting a more streamlined process, and, hopefully in the future, we'll have some interim assessments, and that will provide more guidance along the way and between these time periods between assessments, and so, hopefully in the next few years, we're going to have this interim analysis set up, and we'll be bringing those to the council, and it will go to the APs in the future, but it's just not quite ready yet.

MR. LORENZ: Thank you. I just thought I would ask. Thank you.

MR. HULL: Thanks a lot for that, Chip. Basically, you're stuck with the results of the last stock assessment until a new one is conducted, the way I see it. Tony Constant.

MR. CONSTANT: Myra, I believe you had a chart showing the maturity lengths of females, and I think the showed that a mature female starts at about fifteen inches. Is that correct?

MS. BROUWER: Yes, Tony, and so I'm displaying the chart on the screen right now, and so this is a curve showing the percent of females that are mature at different lengths, and so 50 percent is down here somewhere, and, if you go across the length at which a female red snapper is mature, it's somewhere around whatever length this turns out to be. Of course, it's going to be a range, and not a point estimate, and so I'm estimating somewhere between twelve and fourteen inches.

MR. CONSTANT: Then, as age goes, they quickly go to as much as thirty inches, and they seem to grow from that fifteen to thirty-inch span very fast. Great. I will follow this up later in some of these questions, but this is good knowledge.

MR. HULL: Thank you, Tony. Randy McKinley.

MR. MCKINLEY: Sorry, Jimmy. I didn't realize I had to turn the hand off. It's not raised.

MR. HULL: Okay. Right on. Back to you, Myra.

MS. BROUWER: Okay, and so we can always refer back to this information, and I can pull it up as you guys need it. What I would like to do is go to the questions that we're going to use to try to get more information on red snapper that we can provide to the analysts that are going to be conducting the stock assessment, and so these, as I said before, are a similar exercise to what you just did for gag grouper, and so I will leave it up to you, Jimmy, how you want to handle it. I will leave the questions up on the screen, and then hopefully everybody has something to contribute, and then we can just raise hands, and, that way, we'll have an orderly discussion. Thanks.

MR. HULL: Thanks, Myra. I would like to -- A lot of these questions are linked together, and so I think that the first three questions, if we can all read that, and, if we can get comment on the first three, and then we'll move kind of at a different angle on the descending device and circle hook situation, and so here we go. How has the abundance of red snapper in your area changed over the past ten years? Number 2 is there have been substantial changes to regulations for red snapper over the past decade, and how has this affected the fishery in your area?

Number 3 is catch levels over the past ten years, and when and where are the fish available in your area, and how has this changed? Has the size of the fish changed? Could you briefly describe the trend? Have there been effort shifts to and from red snapper? If so, please describe, and what do you see in terms of discards in the commercial sector? In the recreational sector? How often are red snapper discarded during the open season? What are the reasons they are discarded during the open season? How often are red snapper discarded during the closed season? Do you encounter red snapper as bycatch when fishing for other species? How feasible is it to avoid red snapper during the closed season in your area?

AP, if you can gather your thoughts on this, and your comments, and we can address this, and this is going to be a lot of information for Myra to take in, and be concise and be thoughtful. I see up first is Rusty Hudson. Go ahead, Rusty.

MR. HUDSON: Good afternoon. Question 1, the abundance, we made a significant change by a complete closure there at the beginning of 2010, and yet we were already seeing positive results from the twenty-inch minimum size that had been in place for quite some time, replacing the twelve-inch, and it was just noted a few minutes ago, looking at the maturity levels and then the rapid increase to sizes, that it's not like a one-pound per year and a twenty-five pound red snapper is twenty-five years. It looks like it's eight to twelve years, and that's a big deal.

Then, when we look at this second question, that answers the first, because of the substantial change in regulations that caused virtually a complete shutdown for all the sectors. Catch levels over the past ten years, well, we've been under a virtual trying to avoid what has become a major predator.

A major predator is one that is going to get increased in volume and size in such a way that they affect the other rebuilding plans we have for like baby sea bass and baby red porgies and whatever else that we might be trying to arbitrarily assign to lionfish when a red snapper historically, for people like myself, fishing on them since the 1960s, is that they love a baby sea bass, but, that being said, discards is what it is. We're trying to develop better ways with descending devices, which is Number 4, but it sort of ties in with that last part of Number 3, and we're micromanaging the situation. The red snapper is out of balance, just like the sharks, and we'll be talking about that later in this meeting. Thank you.

MR. HULL: Thank you, Rusty. Tony Constant.

MR. CONSTANT: I have to agree with a lot of what Rusty said. In the past ten years, we've seen a fantastic growth of amount of fish, as well as size of the fish. I honestly thought that the maturity of a female was a little larger than that, which I'm glad to hear, because that means we have a lot of healthy females in the Carolinas.

I do also see an enormous amount of snapper, and, to me, in my opinion, the snapper are eating a lot of the red porgies, especially the sea bass, and I had a conversation last week with a few fishermen about how it's actually hard to go get a true, good limit of sea bass anymore, because all you catch is red snapper, and you're not seeing the sea bass. It's not that they're not there, but they're just afraid to stick their heads out.

With the amount of shutdowns in this area, there is virtually no charters or anything that actually go after red snapper, but the bycatch is remarkable. If you go grouper fishing, you will catch twenty red snapper. Over the last five years, at least, I know, personally, I have probably broken the South Carolina record three times with sizes. When you lay a snapper on a forty-eight-quart cooler to vent it, and it's bigger than the cooler, and you don't see the cooler underneath it, that's a state-record snapper, and it's not uncommon, and twenty to thirty-pound fish are very the norm, but I want to bring something up that I haven't really brought up much since I had a tackle shop in the early 2000s, when, in 2008, we were talking about this closure.

There was an amendment, and I believe it was Amendment 17, or it might have been Amendment 17A, where it recognized latitude 31, and it seems to me that the Carolinas, Georgia and the Carolinas, are having a lot better comeback then they are south of latitude 31, and I am bringing this up due to the fifteen-inch size for maturity. That's a very important measurement, being that, if you're going to have a stock that's growing, you've got to have mature females, in order for that to happen.

Recently, I was around the Keys, and I was around a notable charter captain, who's been fishing there for years, and he was giddy over this eighteen-and-a-half-pound snapper that he had just caught. Well, I was really amazed at how this seasoned fisherman was so absolutely over himself about this large snapper. Now, he released it, and it swam off, but, if it were one of my open days, and I personally would have caught an eighteen-and-a-half-pound snapper on one of our days in the Atlantic, I would have personally been disappointed, because I really was looking for the twenty-five to thirty-pound fish, and so my point is that, south of latitude 31, a seasoned charter is giddy over a fish that we see nothing special about north of that latitude.

I really think that maybe we need to look at this through a lens that we were looking at it through back in I think it was 2013, when Amendment 17 came out, and the Carolinas have a different issue than we have south of 31.

The bycatch in the offseason, we do catch and release, and we use descending devices as well as ASE venting tools. During the season -- When it's closed, and I'm sorry, but when the closed season is out for snapper, we have quite a bit of bycatch, in my opinion. One day in particular, I remember having over fifty snapper caught on the boat, and we only had one floater, is what I would consider, and I don't know if he was eating, and I'm assuming he was, but the rest swam off fine, and I don't know if the sharks got him, and that's something we all hope that doesn't happen, but we think it does, but I think that our shark bycatch is probably our biggest enemy on our bycatch issue. I think that our sizes and our abundance, at least kind of from the Georgia line up, is doing substantially better overall in red snapper.

MR. HULL: Wow. Thanks a lot for that. I appreciate it. Harry Morales.

MR. MORALES: Good morning. I support a lot of what has already been said. As a recreational fisherman, I would say that, over the last ten years, the increase in the abundance of red snapper and the variety of locations in which we're catching red snapper have been almost crazy. Now, I haven't thought in terms of why aren't we catching as much black sea bass, but I think what Tony pointed out could very well be the case, because we would catch a heck of a lot more of them, and, at this point now, the red snapper have gotten so aggressive.

It used to be that you needed live bait to catch them. Well, hell, now you can put darned near anything down there, and we are -- This past year, we had to let go quite a few. Now, we have been catching the big boys, which we use descending devices to send them back down as best we can, and those devices sometimes aren't as reliable, and I ended up bringing the snapper back up two times before I could get him off the descending device, but a lot of I would say -- I measure them, and sixteen to eighteen-inch fish that we're catching.

Have we shifted efforts? Well, when we are fishing, and the place is a little too hot with red snapper, we're forced to move, to try to find the triggerfish or the vermilion, and, during the open

season, we fished the -- We fished three out of the four days, and I would say that we were looking for the big boys, and so we were releasing the under twenty-inch fish, and we were able to catch some twenty-five, some nice, hefty red snappers. I would say that, during the off-season, it is becoming a problem for us in finding a place where we're not going to be catching the red snapper. I would say that that's all I have to report to you on.

MR. HULL: Well, thank you. That was very good. I appreciate it. Next up is Andrew Mahoney.

MR. MAHONEY: I just wanted to say that I support a lot of what everybody else said, and it's pretty much habitat conquering going on with the red snapper off of our coast here, and it's the same thing they've got going on in the Gulf with the red grouper, where they're just getting out of control, and, as far as fishing mortality goes, we're fishing three-times as deep as we are on the Gulf coast, and so our rates are much lower than theirs, regardless of how we treat the fish when we bring them in, and so I just wanted to say that. Thank you.

MR. HULL: All right. Thanks a lot. Randy McKinley.

MR. MCKINLEY: I just wanted to represent like the Onslow Bay up in North Carolina. What we've really seen mostly is the amount of them has really been in the last three years, and they're much closer to shore, and we're seeing them in all different sizes, and I know that, where we're fishing, our dayboats are not encountering them as much as they do up in Morehead, but, as I was saying about those bass, in January and February, we catch a lot of bass, and they're spitting up these small, one-inch, or one-a-half-inch, b-liners, but, in the last couple of years, we're seeing a lot of baby that size Americans mixed in with them, and so I used to assume that a lot of these Americans were just coming up from the south and being run out of their territory out of South Carolina and Georgia, and so evidently they're just reproducing and raising right up here a lot more.

As far as the discards go, I knew it was going to happen, and, I mean, we had hoped that they would split the season for the Americans for North Carolina and open it up in May, but they didn't, and so we did see a lot of discards. May and June is when we're in that range, in that 100 to 120 foot, fishing for the gags and the scamps and the red grouper, but then, later on in the summer, we move offshore for the triggers and b-liners. Anyway, that's what I had to say.

MR. HULL: Thank you. Andrew Fish.

MR. FISH: Hello. I'm in the Cape Canaveral area, and I would say that the red snapper are as plentiful as they've ever been in a long, long time. Our areas are affected, and, in certain areas, we do not fish, because we know we won't be able to get through the red snapper. Certain areas that I king mackerel fish commercially, I cannot -- We cannot fish the rocks, because of the red snapper, and we have to stay away from the rocks, and, also, our depths when we're fishing, as far as how deep our lines are. If we fish too deep in certain situations, we will catch red snapper, and so I would say they are as thick as they've ever been in the thirty-five years that I have seen it.

Another trend that I've seen is we used to not see them in the big schools, out in like 240 and 260 feet, that we're seeing big schools of snapper, even in those depths, which is not common, at least in the twenty years that I've been going out to those areas and those reefs, and that's one of the things that is relatively recent for us in the red snapper. That's about it.

MR. HULL: Thank you, and that's a good point about the trolling, that you can't hardly troll, because they're eating your trolling baits. Richard Gomez.

MR. GOMEZ: For us in the lower Keys, I mean, we're definitely not finding too many fish, and we're certainly catching a lot more fish, and, if you go target red snapper, you're probably going to catch a few, but they're very rarely targeted, because we're still finding them only from 200 to 220 or 230 feet of water, and you don't really get a lot of us charter boat fishermen fishing out that deep for them, especially since we're going to have to release them, but, in the closer-to-shore waters, where we generally fish, I mean, we don't have any problem avoiding them, because they're really not being caught in our normal bottom fishing area, which would be anywhere from thirty to 110 feet of water. That's about it for us down there, and we're still catching them more often on the wrecks, and we're starting to see more in little cracks and little areas of rocky bottom in that 200 to 230 range, but we're definitely not having to run away from them.

MR. HULL: Very good. Thank you. James Paskiewicz.

MR. PASKIEWICZ: Thanks, Jimmy. Basically, I think that we've heard a lot of good information about the red snapper, and I pretty much would say exactly the same thing as Richie. You know, he basically took the words right out of my mouth. I mean, we're not having to do anything to avoid them in the middle Keys area. We're fishing mainly from 110 feet all the way to the patch reefs, and we don't have to avoid them, and so, I mean, I'll just keep it short and simple, and he's on point there for us.

MR. HULL: James, I would have a question for you and Richie. Historically, was there ever a very large abundance of red snapper on that inshore habitat of the Keys? Do you know?

MR. PASKIEWICZ: I have never caught one on the inshore stuff. I've been fishing for yellowtail snapper on the surface and on the bottom, on the bottom lower levels of the water column, and I have never caught one under 120 feet.

MR. HULL: Roger that. I appreciate that info. Chris Militello, please.

MR. MILITELLO: The West Palm area is where I mostly fish, and I can honestly say, in twenty-five-plus years, I have never caught one here, even as deep as 300 or 400 or whatever it may be, but I don't know where the line starts, but I fish in Sebastian a lot too, and it's covered up there, and I don't know where they start, the population starts on the way up, but I have never caught one here. As far as habitat goes, I know that Tom Twyford in the Fishing Club, the West Palm Beach Fishing Club -- I want to say that they put like thirty reef darts out at 600 feet, to try to attract them, or maybe it was 400, and I'm not positive, but I know they're working on that now, the club is.

MR. HULL: Thanks for that information, Chris. Rusty Hudson.

MR. HUDSON: I would like to offer a little bit of historical perspective about the Keys myself, from fishing down there commercially from the later 1970s to the mid-1980s, and, essentially, it was always with bandit gear, and it was usually in the winter, but there was an off-shift from that, and we would -- We were fishing south of like Rebecca Shoals all the way to the Tortugas, and we would be hearing from the yellowtail guys off to the east, towards Key West and stuff, but,

otherwise, we were fishing in mutton bottom, mixed with carberita and gags that we would catch right there at about twenty or twenty-five fathoms and things like that.

Once we got to the west of the Tortugas, I would find some sow snappers, but that's the Gulf stock, and, essentially, when I did fish, and I heard it mentioned, around the 240 foot south of the Rebecca Shoals and the region to the Tortugas, on what would be like a big ledge and stuff like that, I would get a mix of chicken snappers with silk snappers, or yelloweye, and so that existed there, but, having been raised in the Daytona area since 1964, and knowing a lot of some of the historical documents that were written back in the early 1960s and stuff like that about what was caught on what reefs where --

It's pretty much Fort Pierce north, going to the St. Augustine and Jacksonville area has a variety of snapper banks, but the shelf is smaller down there around Fort Pierce, and, once you started getting from St. Augustine north, the bottom changed a bit, but there's a lot of history that shows a lot of red snappers that came from there, but Daytona has a unique thing, and a lot of my professionally-made photographs for my family's efforts from the late 1940s to the 1970s indicate the trend that our region, from Port Canaveral to St. Augustine, was truly the heart of red snapper country for the Atlantic red snapper.

My father-in-law, in fishing the stock like off of Pensacola and those snapper banks, and the other ancient history that goes back into the late 1800s and early 1900s, it shows a trend of people finding a lot of this good bottom and these probably fish stocks at equilibrium, but we're not at equilibrium anymore, because the human population and the changes, where we've got the foreign fleets offshore of twelve miles after 1977, et cetera, et cetera. There is so many things you can point at, but, right now, we can tell that we're predator rich off the Atlantic Florida coast, for sure. Thank you.

MR. HULL: Thank you, Rusty. Vincent Bonura.

MR. BONURA: I was just going to add that, in the Florida Keys, out fishing west of Key West and everything, if you're out past a couple hundred feet of water, there are plenty of American reds out there. Amberjack fishing and grouper fishing, you can't even get away from them out there, and that's all out -- I mean, a couple hundred feet all the way out to like 400 or 500 feet of water even.

MR. HULL: Roger that, Vincent. It sounds like the deep water is where it's at down there, and they don't live in that habitat with those other animals in the Keys or the shallow water.

MR. BONURA: Yes, that's about right. That's about accurate. If you're inside of 150, I have never caught them in there.

MR. HULL: Roger that. Thank you very much. David Moss, you're up.

MR. MOSS: Thank you, Mr. Chairman. I will echo the sentiments of what a lot of the Keys guys have said already, but when you tend -- It used to be, anyway, when you got to about that 200 or 220 range, that's when you would get the red snappers, and, in shallower, that was where you would do your mutton fishing, from 150-ish to like 200 or so, and I know, in talking to a few of

the Tortugas guys, they're seeing a lot more of the red snapper coming in on the mutton grounds and having to kind of weed through them, and so that is happening.

Then the only other thing I will add, and this goes along with what a lot of people have said, but it doesn't answer necessarily to one of these questions, is I understand that everybody is seeing more and more, and we all know that, but, until we get better reporting, certainly from the recreational side, I don't know -- If we're governed by the best available science, I don't know how much we can really do, even though we all know that it's there.

MR. HULL: Thank you for the good comments. Jack Cox, you're up.

MR. COX: I've got a few things to contribute here, and, you know, I've been in the fishery since the 1980s, the early 1980s, and I think we deserve a pat on the back, all of us, because this is management working at its best, and I have lived through the years of overfishing, and it's just good to sit back and see what we've done to rebuild it, and so it lets us know that there's work that we can do on other species to get where we are with this one.

To go through the list here real quick, over the last ten years, we're seeing the fishery populate, and the red snapper fishery is doing just what it should do, and, on the commercial side -- Just to let everybody know, I'm in North Carolina, commercial fishing for them up here, just off of Cape Lookout, but we're not seeing the fish in the deeper water like we did years ago, back in the 1980s and 1990s, but we certainly are in the shallow water.

When we're fishing for gag in certain areas, it's kind of hard not to interact with them, but we certainly can go to places that we don't interact, and so they are traditionally coming back to the places that we used to see them in the 1980s, and not all the places, but a lot of those places are in about 100 to 125 feet of water.

Going down the list here, the fish -- You know, we're seeing all different sizes. We're seeing the small fish, and we're seeing plenty of big fish in the shallow water. You know, it's not uncommon to go catch twenty-five or thirty-pound fish, which it's really cool to see those fish where they used to be. As far as us commercial fishing, if we're fishing for -- Some of the places that we're fishing for gag, we're seeing a lot of the juvenile gag, and a lot of the bigger red snapper mixed in with them, and so we're able to move off of them, but, if we're wanting to catch the gags now, we will move on out to different places, where we're not seeing the red snapper and catching a few of the bigger gag.

The descending devices, that's all new to us, and a lot of the guys are -- Everybody is just kind of getting accustomed to it and using it, and hopefully that will catch on faster, and I think the circle hook is definitely a plus. We're seeing a lot more fish doing better and getting down using the circle hooks than we would in past years. I think that's about all I've got, Jimmy. Thank you.

MR. HULL: Thanks for those comments, Jack. Bob Lorenz, you're up.

MR. LORENZ: Thank you, Jimmy. It's been interesting listening to everybody, and anything I would put in here would be more than -- It would be about two years or longer, and so I'm not going to state it, but I thought that maybe I will just bring one thing up. There might be some positives among some of us, and we may want to look at that, and that fits also with my question



of what's the endpoint of the snapper recovery, but, this year, I think we could have had a little -- I am up here in southern North Carolina, and I fish in Onslow Bay, but I have nothing to say about red snapper --

MR. HULL: Bob, you're kind of in and out on mine, and so maybe get closer to the microphone.

MR. LORENZ: All right. Thank you. I was going to state that one thing you might be seeing is collateral conservation, and one thing that has happened is I think the pandemic, with certain fishermen, and maybe they're your problem ones, the private boat recreational fishermen, and I have some peers and friends that they can afford to fish anytime they want, but they haven't, and that's the pandemic has affected things, like some of us getting together with a crew and getting out, and they might not want to risk it, and our spouses and things don't want us together.

Though there has been a lot of increased boats and all this year, a lot of it ends up being taken out by a family, and maybe there has been less red snapper fishing among some people this year than others, and I was one, and one of the changes that has happened with the regulations is the season kind of only opened in the middle of the summer, and there are a lot of us that are kind of getting up there, where it gets tough fishing offshore, in ninety feet of water or so, and so you're talking twenty-five miles or more out, and we're just not going as much as we were, and the pandemic kind of clamped a lot of that down for many of us.

MR. HULL: Are you still there, Bob?

MR. LORENZ: Yes, I am. Could you hear me? I muted myself, and I'm finished. Are you not getting me, Jimmy?

MR. HULL: I am getting you now, and you were good until maybe the last half sentence there, and then I lost you, but I hear you good, and I think Myra heard you good, too.

MR. LORENZ: Okay.

MR. HULL: Okay. I don't see any other raised hands, and I would like to provide comment. I can tell you that the abundance of red snapper in my area, which is northeast Florida, specifically out of Ponce Inlet and fishing to the north or the south of there, and I've been fishing all my life, since I was a child, and I'm sixty-five, and I continue to fish commercially. There has never been more red snapper than there is now. Over the past ten years, it's off the charts, the growth in the stock. I guarantee you that you have never seen snapper, and I don't care where, like we have off of northeast Florida. It is absolutely absurd.

How have the regulations affected us? Well, obviously, when you have a closed fishery, we have a problem. Also, when they implemented a twenty-inch size limit, that was really good, and that's when we started to see the rebuilding of the stock and an improvement of the stock, because there was a time when, prior, in the 1980s and 1990s, that the stock was in decline, but, when they implemented a twenty-inch size limit, then we started to see major improvements, and then they shut us down.

The fish in my area are on every reef, every wreck, every small piece of live bottom that you can imagine, and you will be trolling over sand, and you will find schools of red snapper on bottom

that really you didn't know was there, but there's some worms or some crabs there or something, and so they're everywhere. They have also run the bass off of all of the bass bottom that we have fished, and it's gone. All you will catch is snapper. There's very few places that you can catch a black sea bass anymore, where I fish, and there's some, but not much.

As far as effort shifts, obviously, when you catch red snapper, and you can't keep them, why fish there, and so, yes, there's been effort shifts from red snapper, and we haven't had a fishery, or, at least the last couple of years, we've had a small fishery, with a seventy-five-pound trip limit, which has been great.

As far as discards, obviously, if you drop a bait down anywhere I have just described to the bottom, or to the surface, for any length of time, you're going to start catching red snapper, and they're going to come right up under the boat, and, in fact, they will come up under the boat before you even put a bait down, vast schools of them. You can go to a spot and get ready to fish and look in the water and there they are, by the hundreds.

How often are they discarded during the open season? Yes, there's a lot of high-grading that goes on, and there certainly is. We prefer smaller fish for the marketplace, and the bigger fish are not as valuable to us at the fish house, and we prefer five-pound or eight-pound fish, and those are perfect. During the closed season, again, as I said, obviously, we're discarding. For other species, yes, there is -- When we're grouper fishing offshore on the ledge, 160 out to 220 feet, we're catching snapper in all depths. In fact, all the way out to 600 feet, on the bases of steeples.

It's impossible to avoid red snapper. We can go vermilion fishing, which is our bread-and-butter now, and you can start out just below the boat, thirty or forty feet, in 140 feet of water, and catching berms and triggerfish, and it's just a matter of a little time and here comes the red ones, and they take over, and so that's what I had to add to it, and I see Richard Gomez. You're up.

MR. GOMEZ: Thanks, Jimmy. I am hearing all this discussion about not being able to avoid the red snapper, and then correct me if I'm wrong, but, at the beginning of this conversation, Myra was speaking about having a smaller season this year, and, if that's true, I'm just wondering why we aren't discussing giving more fish to the fishermen, rather than taking more time away from the fishermen, and I'm surprised that we're not trying to get something done to be allowed more fish and a longer recreational season. That's it for me.

MR. HULL: Well, Richard, that's a great comment, and a great question, and, obviously, the last assessment is what we're going by, as far as any fish that are going to be given to us, both recreationally and commercially, and there is a stock assessment that has started now, and so, even with the results -- They are pushing the stock assessment as quick as they can.

Even with the new results of SEDAR 73, the current operational assessment, the results won't be ready to change management, no matter what comes out of it, for this coming year, and so you're still stuck with the old stock assessment results, and therein lies a lot of the problem, and so it is a problem, and it's not going to be a very pretty picture if the stock assessment comes back with much better results and you have a recreational season that's reduced by a day. I hate to think of that, and so that's a great question, and maybe we can talk about it some more later. Is there anyone else that would like to provide comment on the first three or four items here, before we

finish off the rest of these items? Raise your hand. Myra, was that adequate for you on the first part of it? I think it was, but what do you say?

MS. BROUWER: Absolutely, Jimmy. Thank you.

MR. HULL: Okay, and so, AP, let's look at the whole rest of this, all in one. We're going to talk about descending devices and circle hooks, and how often are you using descending devices to release red snapper? What percentage of fishermen in your area would you estimate to be using descending devices? Is there a specific type of device that you prefer using? Have you observed shark depredation while using a descending device to release a fish? Do you think that the use of descending devices and/or circle hooks has improved survivability of red snapper in your area?

Then we'll get into the social, and I want you to go right in and answer the next questions also, the social and economic influences. How has demand for charter/headboat trips targeting red snapper changed? Among the species you target, how important are red snapper to your overall business, charter or commercial? What communities are dependent on the red snapper fishery? Have changes in infrastructure, like docks, marinas, and fish houses, affected fishing opportunities for red snapper? How have fishermen and communities adapted to changes in the red snapper fishery? Then Number 6 is management measures. Are there new management measures that the council should consider under existing restrictions?

Then, finally, environmental and ecological habitat, and have you noticed any unique effects of environmental conditions on red snapper? What are your observations on the timing and length of the red snapper spawning season in your area? What do you see now in terms of recruitment? Where are the small fish? Are large and small fish found in the same locations? Has there been any shift in catch, inshore/offshore or north/south? How have sea conditions affected fishable days for the commercial sector? Have you observed changes in catch depth or apparent bottom type fished on? Obviously, we have answered a lot of these already, and so you don't have to rehash it.

Have you noticed any change in the species caught with red snapper over the years? Then is there anything else? Is there anything else that's important for the council to know about our red snapper stock or red snapper fishery that you want to tell them? Let's try to push through this, and we'll try to avoid redundancy, if we can, and the first hand raised is Rusty Hudson. Go ahead, Rusty.

MR. HUDSON: Can you scroll down to Section 7, please? Thank you. Where are the small fish? Well, some of the work that we've done here in the heart of red snapper country includes finding age-zeroes and age-ones, and they're not located on the same reefs that the older red snapper, the ones, twos, threes, et cetera, are.

Another thing to keep in mind is that, once they're like age-eight and twelve, they are very predatory, instead of trying to find a place to hide, like the younger red snapper, and so the younger red snapper will stay in the lower to middle water column, whereas the sow snappers and pony snappers, and, in other words, twelve to thirty pounders, they get all the way up to the surface, and some of the commercial guys that fish for black sea bass with their pots will watch these big red snapper follow stuff up, and you can catch a fish like a big red snapper and you will see other ones follow it up, and it looks like a big pile of red drum or whatever, as thick as they've gotten. I just

wanted to throw that out there, that that was a feature that we used to fish that way back in the 1960s for me, and 1970s, but I'm sure some of the older folks did it a little bit in the 1950s, too.

MR. HULL: Thank you, Rusty. I'm sure that somebody else is going to raise a hand here and comment on descending devices and circle hooks, and, obviously, for me, in our fishery, we are using a descending device, and we use a sash weight with an inverted hook on it, and a line, and it works very well, very quickly, and we use an eight-pound sash weight, because we use it in the deep water and shallow. Now, very small fish, we still vent, but we use a descending device on the bigger animals. Go ahead, Tony Constant.

MR. CONSTANT: Talking about descending devices, they're a great item. They're fairly new to us, meaning the last year or so, and we're using the ones that you adjust the depth, because we are fishing fairly deep, and we're catching most of our snapper 120 to 150 deep, and so we're releasing them around a hundred. We're using three-pound weights, and we have great success, and I haven't encountered many sharks yet with ours. I am sure that can be a problem, but I saw sharks back in the days when we just vented them.

I did want to say that what Rusty was saying and the small -- Where we fish, we do not catch very small fish, and I would say the average is fifteen inches, maybe five to eight pounds, on the small side, and, as far as the aggressiveness, they seem to be very aggressive at that size and larger, and, back to what someone was saying earlier, we are -- In South Carolina, I am noticing a lot more schools in the middle to -- But not on the bottom. More in the middle water column. If you're in 120 feet, you're seeing them at eighty to a hundred feet and very aggressive. As far as other species that have been affected over the years, I think we've covered that with the amount of smaller fish that have become predators now, instead of equals in the food chain, and that's it.

MR. HULL: Tony, I would like to ask you also -- I think you're in the charter business also, and even had a tackle shop, I think you said, and so how is the like social and economic influences with this red snapper fishery that's going on, and, obviously, it's a catch-and-release, mostly, especially recreationally, and you only have three or four days, and how is that socially and economically -- I mean, are you still able -- How does it affect you, and then, also, have you seen, environmentally and ecologically -- I'm just trying to get a little more out of you here on some of these questions, if you would.

MR. CONSTANT: Honestly, it crested early on, back in 2010, and we ended up closing the tackle shop. It was a lot of -- We also catered to a whole lot of tournament fishermen, and, back when the recession hit in 2008 and 2009, that really crushed those tournament fishermen, and everybody was getting rid of those go-fast boats, but, on the charter side, just the word of a snapper closure hurt the charters.

We immediately saw that happen back in 2008 and 2009 and 2010, and we have -- The snapper runs right up into our channel, and it was the norm to run out and catch a handful of snapper and then move and go catch something else. When that was eliminated, it was devastating to both the tackle and to the charter. As far as ten years later, ten or twelve years later, it's non-existent. Red snapper is not even mentioned, other than they're in the way.

We don't go get the groups of sea bass anymore, because you catch fifteen or twenty snappers, and your customers get frustrated, and they're from Indiana or so forth, and one of our big charters

here -- In Beaufort, we have Parris Island, and so, every weekend, there's a graduation, and so the town is basically flooded with people from Indiana and Pennsylvania and all over the whole country, and so, while they're here, the family books up a charter, and so that has definitely changed the charter business, as well as the tackle business.

MR. HULL: Thank you for that. I appreciate it. Randy McKinley, you're up.

MR. MCKINLEY: Thank you, Jimmy. Just a few different points that I would like to make on this. One is that we do use the descending device, and we don't have to use it as much, it seems like, on these fish, and they're strong fish, and the biggest majority take right off back to the bottom, when you're in that eighty or ninety or a hundred foot of water. As a dealer, I'm such a proponent of the bycatch allowance, and I just -- It's a fish that has just a name recognition, and, as sought after, like the American is, it's a shame that we don't have some kind of bycatch allowance to keep them on the market longer. Also, as far as we are definitely seeing them push way up inshore, in thirty or forty or fifty foot of water that we see them. That's it.

MR. HULL: Thank you. David Moss.

MR. MOSS: Thank you, Mr. Chairman. Myra, can you scroll up just a little bit? I don't remember all of them. The biggest one that I was going to comment on was, as far as the descending devices, I mean, I don't do a lot of red snapper fishing, but we do use descending devices here for other species that we fish for, and, in speaking to a couple of captains that use them around here, and, in fact, one that has had one for four or five years, and he was given one as a trial, and he loved it the first time he used it, and he bought another one, because he figured a shark was going to eat it right away, and he's had the same one for those four or five years, and he hasn't has a shark issue, and he fishes out of Jupiter, and so it's shark central there.

As far as the management, and I think it was on 6, and there was something about different management. Again, I think this goes back to what Richard Gomez was asking earlier. Until we get a grasp on the real recreational data, it's going to be tough for the management agency to do anything, because, if we're going by the best science available, that's all the information we've got, and, until we get a grasp on the recreational data, it's going to be tough.

MR. HULL: Thank you, David. All right. While we're waiting for maybe somebody else, I'm going to chime in again where I left off, and, obviously, we're using descending devices off of northeast Florida and circle hooks, and, as far as have you seen shark depredation while using descending devices, no, I have not, not while I am descending any of these animals with an eight-pound sash weight, but that doesn't mean that once they get to the bottom -- It may take them a minute to reacclimate, and they may be getting eaten, but definitely, on catching the fish, we're seeing shark depredation, but I'm not seeing anything since I've been using my descending device. I see Andrew Fish. You're up.

MR. FISH: On Number 6 there, management measures, obviously, we've talked about this before, but we're catching these red snapper in the heart of the spawn, when they're all full of red snapper, and that's one of the things that I would like to see acknowledged and changed. I know that's the best time of weather for the seasons and all that, for everybody to get the calm weather, but it's kind of detrimental, in my opinion. Definitely the circle hooks and the descending devices do work, and I have not seen shark predation on a descending device, that I'm aware of.

As my opinion, I would not think that many people are using the descending device, or at least not the one intended, and I think a lot of the guys are using their standard practices of venting and releasing, and that's just my opinion.

If you scroll down to 6 and 7, I think, as far as affecting the charters, I think as many of the guys that hate that it's closed, the red snapper, it also gives them an out when the fishing is terrible and there is nothing to catch, and they can always kind of rely on those red snappers to bite, and so, as far as the recreational fishing on red snapper, I think they're really happy, but it's the meat hunters, the guys that charter those guys, that are really unhappy when they catch these beautiful, great-tasting fish that they can't eat, but, other than that, that's about all I've got.

MR. HULL: That was very helpful. Thank you. Andrew Mahoney, you're up.

MR. MAHONEY: As far as the communities that are dependent on the red snapper fishery, I think all of us in the commercial sector have communities that are dependent upon us, especially with the rates of metabolic diseases that are out there and the fact that we have this high-protein natural resource just off of our coast.

The management measures the council should consider under existing restrictions, the hook catch rate efficiency of circle hooks to j-hooks I think needs to be looked at, especially since there is some species that have a 50 percent change, increase or decrease, in catch rate efficiency, and that might determine a lot with our total landings, and, if you go down a little bit, and I can't remember what the other ones were there.

There is a lot -- Where we're at, and, you know, we were talking earlier about there being a lot of different types of fish out there, as far as red snapper goes, small and large, and they are pretty much -- I mean, if you can get on a spot with the small fish, there is millions of them, it seems like, and you just go to a spot where there is big fish, and there is just as many of that, and so I think we've got plenty of small fish out there and large fish, and so I think everything, in that case, is pretty good. I don't know. That might be all, I think.

MR. HULL: Good comments. Thank you. Tony Constant, you're up.

MR. CONSTANT: I just wanted to say something about the descending devices a little bit more. We've had no shark depredation that I have known since we started using it, and I have asked that question amongst about eight or ten of my friends that are seasoned fishermen using theirs, and finding out what type they used, and, honestly, I have probably seen three or four different types, and all have the same results, is what I am hearing, and nobody is having shark issues, and everybody is having good results.

They seem to be working, and, as far as the management tool, I think it's really spot on. I think it's as good as the circle hook. I mean, the circle hook is a fantastic tool, and almost 100 percent of the catches are in the lip, and so you can't hardly argue with that kind of ratio, but, yes, I think the descending devices are a very good tool, and we need to keep them in place, and I have seen widespread the same answer.

MR. HULL: Thank you. That's great. I'm going to add to what I've been saying as we go along here, and the social and economic influences, as far as the closure of the fishery in 2009 and then the small tiny seasons we've had, have been devastating to the coastal communities that depend on our reef fish, which is all of our coastline, and red snapper, for most of us, was our bread-and-butter for our entire life, and then it was taken away, and so it's been devastating, not only for the commercial side of it and the consumer access, but also your charter boats, your private recreational, industries that are associated with all of this.

It's been devastating, totally devastating, and I will say it's also been very harmful to the ecosystem, because we just have -- You know, you can't just stop catching these animals now, because we've just changed everything so much with our human interactions. There is just no way to adapt to it, other than to try to find something else that you can fish for where you don't interact with red snapper, and that's pretty hard to do.

As far as management measures that would help, obviously, I like the idea of a spawning season closure. I don't like catching these fish in the middle of their peak spawn in July. I do not like it. I don't like opening these fish up and seeing all that spawn in there. It's not necessary to do that, and we should pick a better time.

We also need, on the recreational side -- We have to get a grip on what's being caught. We need a recreational stamp or a permit and some better reporting on that, and that has to happen, so that we can get a grip on what's actually being caught, the universe of recreational anglers. As I said, I think that we're not helping the environment or the ecology or the habitat by having this closed fishery.

That's everything that I've got, and the only thing that I would recommend is that the council would recommend to the SEDAR, and to the science establishment, that they need to conduct some hook-and-line sampling of this species, continuously, year-round. Monitor the fishery, even if it's closed, and we need fisheries-independent hook-and-line sampling year-round across the region.

Then they would have a much better picture of the stock status, instead of using the methods that they're using now, which they rely on the chevron trap as their main indices, and so I would hope that they would request that they develop and fund a year-round hook-and-line sampling, the same way we address the fishery, a hook-and-line sampling, and do it in a fisheries-independent manner, and they can do it cooperatively with us, and so that would be something that I would like to see. All right. Anybody else? Now is your chance, or we're going to move on from this. Okay. Jack Cox, you're up.

MR. COX: Jimmy, I just want to second what you just said in your last points there about that cooperative research or whatever it takes to get that hook-and-line data on what's going on with these fish. I mean, it's so important, and I just don't understand why we're not using it, but that was really good, and I just wanted Myra to collect that, that I support that as well, and, also, the recreational stamp, and, you know, we've got to get that data. We've got to know what the universe looks like and who is fishing on it, and the council has talked about it for a long time, and we've never gotten anywhere with it, and so I just want to emphasize how important that would be to have that information. Thank you.

MR. HULL: Thank you, Jack. Okay. I see some more hands. Tony Constant, you're up.

MR. CONSTANT: Something about the hook-and-line sampling, and, back when sea bass was done, there was a guy that NOAA hired to do hook-and-line sampling, and he worked out of my store, back when I had my tackle shop, and they really dictated to him where, how, and what to use to fish. He made the comment to me once that, out a thousand fish, he had three keepers, and ninety-seven were small, but it was the methods and the way that he was dictated to fish.

I think that, if they do hook-and-line fisheries, they need to leave it up to us to fish and not tell us that we have to use this rig with this hook with this piece of bait, and that's what was happening on a lot of the sea bass recordings and data, and so, if they let us put our numbers and fish the way we fish, we could show them some results, but, if we have to go to this hole and fish this way, the data is going to be different. That's it.

MR. HULL: Thanks a lot for that. I mean, there's a lot of conversation to be had on that and how they would set up a sampling protocol that has to be done, and there's fisheries-independent and fisheries-dependent, but, if the fishermen are involved from the beginning of the venture, we can conquer a lot of that, you know, and so the fishermen have to be involved, and that's why it should be done cooperatively, but they need to do it in a scientific method that they can use in stock assessments with very little bias. James Paskiewicz, you're up.

MR. PASKIEWICZ: Thanks, Jimmy. You know, I've heard a lot about the red snapper fishery and the way that it has evolved over the last ten years, with stocks coming up, and it's not of a major concern to me, but it sounds to me like what the conservation measures, or the fisheries management plan that's been put into place here for red snapper, it should be the poster-child for how to rebound a species and get it back to a viable level.

Kind of going along with the idea of when is it that we get back to a level that we consider this species rehabilitated and we can start harvesting it on an annual basis at a larger level than what we're doing now, and there's a lot involved here, but it seems like we're seeing a lot of success, and we also have a lot of other species that are in grave danger, as far as I'm concerned, in their stock assessments, and maybe a ten-year break wouldn't be so bad for different species if this was the result that we were going to end up with.

I mean, there's a lot to be said, and there's a lot being said right there, but, you know, we need to be able to harvest this species to help reestablish a balance, to where we can be sure that the red snapper are not -- That we're not shooting ourselves in the foot with other species with this predator being on the loose in these kinds of numbers. I am not really suggesting anything directly, but I just feel like it's kind of our charge to take a look at all of these things, and, if we're seeing successes with the species, maybe we can apply it in a different way and help restore balance.

MR. HULL: Well said. Chris Kimrey, you're up.

MR. KIMREY: I am up here in Morehead, Atlantic Beach, the same as Jack Cox, and I'm a full-time charter guy, and I'm new to the AP here, but, not to beat a dead horse, but, with the red snapper, as far as calculating, you know, the hook-and-line, just like you said, this for-hire electronic for-hire charter boat, this program that's been dragging for years, I was one of the original prototype people. When I heard about it, I volunteered willingly, because I wanted the recreational and the hook-and-line guys to have a means to report, as accurate as possible.



We started at the state level with trying to push a charter boat reporting of some sort, before the feds decided they were going to make us do it, and there was a lot of opposition here, and so, when I heard about the federal thing, I jumped onboard, and, of course, it's been dragging on for years now. I was part of the prototype for the software, and it was going to start two years ago, one year ago, and now they're saying January, but, you know, long story short, red snapper is a very good example of how you could use this reporting software to get a much more accurate hook-and-line catch, versus chevron traps.

Like the sea bass that he was talking about, I'm very familiar with how that unfolded, and it was way off-course, because of the way they dictated the sampling be done, but, with the for-hire electronic reporting finally coming to fruition, if they would issue some sort of limited season, outside of the spawn, and even if it was just for the for-hire people that are going to be required to report weekly, they could get a much better idea of what is actually out there, from people like myself, and I've been here my entire life, commercial fishing and bottom fishing, when I was younger. The last twenty years, I've been a full-time charter guy, and there's a real good chance that I'm going to know where to find the fish, versus somebody that has no idea about the area, and, if I'm required to report, because it's a passion to me, I'm going to do it as accurate as I can.

Now, I was in south Florida during MREP, and I know that they don't want to validate the science on this weekly reporting without VMS and all that kind of stuff, but they could still have much more accurate reporting if they would just let us do it, and now, with this electronic deal going down, they've got an opportunity. If the channels that be would come up with some way to present it to them, where they would use it as semi-validated numbers, versus these old-ass surveys. Excuse me, but these older surveys that won't let us keep fish now, when we can go, and you can ask Jack, but we can go to the east side, and we can walk on these things.

It's impossible for me, because most of the grouper fishing that I do is inside of twenty fathoms, because I'm fishing a smaller twin-engine center console, and a lot of the places that I used to catch groupers I can't even fish, because the snappers are so thick. Just like somebody else said earlier, and, if you get these folks from out of town, they are familiar with what a red snapper is, but they're not familiar with the moratorium that's been in place for ten years, and they're not familiar with anything other than he's got this fish of a lifetime, this twenty-five-pound snapper, bigger than anything he's ever caught in a lake from back home, and he has to let it go, and that's all he's familiar with.

It's hugely frustrating for us to know, and this is the case with all science, and it's best available science, and I get it, but it just seems like there's an opportunity. If there was some way they could fine-tune the process with people that are familiar with the fish and that are required to report, that know where the fish are, they could speed up -- For certain things like this, where there are just piles of evidence that the fishery has recovered much faster than possible, if they would just give us the opportunity, we could probably help. That's kind of beating on what everybody else said, but it all ties together, if there was just a way that we could figure out how to make it work.

MR. HULL: I agree. Thank you for that good comment. I think we have covered this pretty good, and I will just leave you with one other thing. There's a SEDAR 73 website, and there's an operational assessment that is being conducted right now, and you can go to that, and you can make public comment on your red snapper fishery, and you can make a comment on the science,

and it's not about management, and it's about science, and so, if you have some thoughts and things you want to say to the SEDAR analysts and others, and it can be seen by everyone, and there is an opportunity to comment on that stock assessment, and just Google it up and go to make a comment, or read comments, and all the working papers are there, and you can get involved and let them know what you know. Myra, I think that we have given you what you need, I hope, and you'll have to let us know that.

MS. BROUWER: Thank you, Jimmy. Yes, that's a lot of information, and it's going to take me a little while to synthesize it all, but, as you said, the intent is to summarize it and provide it to the analysts who are conducting the assessment, and so thank you all for that. It's up to you, Jimmy, but we could potentially take a short break, and the next item on the agenda, I believe, is the evaluation for the need for conservation and management for a couple of snapper grouper species, nine of them, actually.

MR. HULL: Well, Myra, I think that -- With this webinar setting, I think, if somebody needs to take a break, they can just walk away and take a break and come back, and I would like to keep moving, if we could, unless there's a bunch of objection to that, and we've got a lot to cover, and I would like to get it done, and so, unless somebody raises their hand and says, no, they want to take a formal break, let's go ahead and move on.

MS. BROUWER: Sounds good to me. Give me just a second to get myself gathered up over here to pull up the next item on the agenda. This item on the agenda is to talk about whether nine snapper grouper species that have been recommended by the council's Scientific and Statistical Committee -- To determine whether they should continue to be included in the fishery management plan for the snapper grouper fishery, and so it's to evaluate whether those species should continue to be managed at the federal level.

What I am going to do is give you sort of an introductory little presentation on that, and then we're going to walk you through another one of our little online application tools, to help along with the discussion, and we'll ask you some specific questions of what we would like the AP to contribute to help the council with those discussions.

First of all, under the Magnuson Act, the councils are required to prepare fishery management plans for all fisheries that require conservation and management, but what does that mean exactly? There's some guidelines in there, and there are some factors that need to be taken into consideration to make this determination. Stocks that are predominantly caught in federal waters, and those that are overfished, are undergoing overfishing, or are likely to become overfished or undergo overfishing definitely require conservation and management.

Outside of those, the Magnuson Act has, as I said, some factors that are supposed to help the management agencies to determine if other species that don't meet these particular criteria should be included in a management plan at the federal level, and so here's this little graphic that I got from the NMFS website that kind of walks you through the process a little bit, and so, if the stock is overfished or subject to overfishing -- If the answer is yes, then we need to include it in an FMP.

If the answer is no, then there are these ten factors that I am going to walk you through that should allow you to determine whether that stock should be included in the FMP or if it could be removed

from the federal FMP and allow the state to manage it, or the other option is to designate it as an ecosystem component species, and I will tell you what that means in just a little bit.

These factors are going to provide the basis for this determination for the need of conservation and management, and the South Atlantic Council has not added a stock to existing FMPs, I believe since the establishment of the council system in 1976, and there have been some species that were removed. When the council worked on their Comprehensive ACL Amendment, there was a slew of species, I believe thirteen of them, that were removed, and, subsequently, in more recent years, the council removed blue runner from federal management, and they removed dog snapper, mahogany snapper, black snapper, and schoolmaster, most recently, from the Snapper Grouper FMP.

Here is where I am just going to quickly walk you through these various evaluation factors, so you can have more of an idea of the kinds of information that is necessary to think about in order to make this determination of the need for conservation and management, and so Factor Number 1 is is the stock an important component of the marine environment? Arguably, everything is an important component of the marine environment, but I think this means more of are there things in the biology or the ecology of that species that are going to make it particularly important, and so is the species, for example, an important prey item? Is it an important predator? Those are the kinds of things that I think is where Magnuson was coming from for that particular factor.

Number 2, is the stock caught by the fishery, and so, here, you look at the composition of the landings, what is being caught where and by what sector and so on. Factor Number 3 is could an FMP improve or maintain the condition of the stock? Here is where, if there is a stock that could be at risk for overexploitation, and maybe because of some life history characteristics, such as being targeted when they are spawning, or maybe it's a migratory species, and so is there a way - - Is there something about that species where an FMP, a fishery management plan, could help improve management or the condition of that stock?

Then there's three more factors, 4, 5, and 6, and we've kind of just put them all together, because there's a lot of overlap in these things, and they're not mutually exclusive, and so Factor Number 4 is is the stock a target of a fishery? Number 5, is the stock important to commercial, recreational, or subsistence users? Number 6, is the stock important to the nation or to the regional economy?

In order to make these determinations, you would look at landings, and look maybe at the distribution between federal and state, look at things like value, and here's where information in fishery performance reports, like you just did for red snapper, direct information from fishermen, is very valuable. If you do know the level of optimum yield, then you can evaluate whether the fishery is obtaining OY, and so all those things could be considered for those three factors there.

Number 7, is there a need to resolve competing interests and conflicts among user groups? Here is, I think, where we consider things like issues like accessibility that can cause a disproportionality among resource users, and perhaps there is a seasonal availability that changes in different areas, because of migratory patterns or weather or gear conflict or what have you, and so that's the kind of information that we will be assessing for that.

For Factors 8 and 9, again, there is a lot of overlap here, and these are more focused on economics. What is the economic condition of the fishery, and could an FMP produce more efficient

utilization, and so, here, you could look at things like value and fishery production, what are the needs of the developing fishery, and could an FMP foster orderly growth? Then, finally, I believe, Factor Number 10. To what extent is the fishery already adequately managed by states, by state/federal programs, or by federal regulations under other FMPs, maybe by international commissions or industry self-regulation, and so, basically, are there adequate state regulations in our region in place, and that would be another factor that would contribute to the council evaluating whether a species should continue to be managed at the federal level or not.

Once those factors are used to make these evaluations, as I said before, then the species could potentially be removed from the FMP, or it could be designated as an ecosystem component species, and so, under Magnuson, this is defined as a stock that a council has determined that doesn't require conservation and management, but would help -- Keeping it in the FMP would help address ecosystem management objectives, and so then you ask yourself, okay, what are these ecosystem management objectives? What are they, and do we even have them in the snapper grouper fishery?

I am going to just give you a little bit of history here, because I know there is several new AP members, and so the council went through an exercise, several years ago, that they called the visioning project, where they set out to revise, I guess, the goals and objectives of the fishery management plan and come up with a strategic plan, and that was the vision for the fishery going into the future that would help them figure out how to manage the fishery better and take into consideration feedback from stakeholders up and down the coast.

As a result of this exercise, this vision blueprint for the fishery was born, which the council has been using in order to help them focus their management efforts, and, as part of this blueprint, there were a couple of objectives that were included in there that have not yet been adopted under the management plan, and that's going to be done in Amendment 48. I talked about it this morning, and it also includes the wreckfish ITQ modernization actions.

There is two objectives under the science and the management goals that deal with promoting data collection and analysis to support ecosystem and habitat considerations for the fishery or support measures that incorporate ecosystem and habitat considerations for the fishery, and so those would be -- They are very broad, of course, but the council could determine that these nine species that we're getting ready to talk about are important in order to maintain these ecosystem objectives under the FMP.

Once the council determines that a species does not require conservation and management, there is four additional factors that need to be discussed in order to determine if that species does in fact -- If it's a good candidate for EC designation, ecosystem component designation. Is the species a non-target species or a stock? Is the species -- It has to be not undergoing overfishing or overfished or approaching overfishing and overfished condition. It needs to be not likely to become overfished or overfishing in the absence of conservation and management, and it should not be generally retained for sale or personal use.

I should say that there have been species in the Snapper Grouper FMP that have already been designated as ecosystem components, and that was done -- You don't have to meet all four of these factors in order to make that determination, but there does need to be a rationale based on these

factors, and so I believe that, in the Comprehensive ACL Amendment, the species that were designated as ecosystem component species met three of the four factors.

What feedback can the AP provide? We're going to be reviewing information for blackfin snapper, coney, cubera, margate, misty grouper, silk snapper, saucereye porgy, yellowedge grouper, and yellowfin grouper. As I said before, these are species that were recommended by the Scientific and Statistical Committee for the council to reconsider whether they should be managed under the FMP.

They did this back in October of 2019, and they were reviewing trends in landings, and they were discussing adjusting catch levels for all these species, and these are all species that don't have stock assessments, and so we call them unassessed species, and so the SSC was looking at landings and trends, and, for many of these, the landings are very low, sometimes in one sector versus the other, or sometimes both of them, and we'll get ready to walk you through all of that here in a minute.

What we want you guys to do is provide observations, or recommendations, that are going to help the council determine whether these species need to continue to be managed under the FMP, and, as far as timing, this is a conversation that's going to be happening at the council table in December, and they have not yet given us direction to begin an amendment to do this, and so we're very, very early in the process, and so I kind of want you guys to focus on a sort of big-picture discussion and not drill down too, too much into each of these species, because we could be here for a long time if we do that, and so, with that, I will take any questions, and I'll get out of this full-screen mode, and then we'll get Mike Schmidtke, who is a new council staff, to walk you guys through this tool that he has prepared for you. Are there any questions?

MR. HULL: I see Bob Lorenz. Go ahead.

MR. LORENZ: Thank you, Jimmy. Myra, I will back off, and maybe I'm jumping the gun, not knowing what the -- Just one comment. Any species could have some sort of ecological value. For example, margate could be used as grouper food, and that would be one comment. The other thing was, during this exercise, will we ask -- Do they currently have some type of I will say commercial value, because, as I sit here -- I mean, after I reviewed this, I am looking at the two smallest fish, like the margate and the saucereye porgy, and I'm wondering what value they would be, plus they might be the type to be rather small, and I don't know. I don't think the margate has a significant economic value or commercial value, but those kind of things could remain managed in that aggregate species that we have, at least on the recreational sector, for a number of these species.

MS. BROUWER: Thanks for that, Bob. Jimmy, if that's okay, I would like to go ahead and address Bob's question before we get Richie.

MR. HULL: Perfect.

MS. BROUWER: Okay. Thank you for that, Bob. In terms of value and landings and other information, diet information and all that, we're going to present that to you guys this afternoon, and I want to preface it by saying that it's the information that's available to us, and so what we will want you guys to think about, as you all are reviewing the information, is does it make sense

to you? Is it -- Does it jibe with the observations, and, in your experience, is that accurate information, and, if not, then speak up and tell us why. That is the kind of exercise that we're getting ready to do, and there was another point that I was about to make, but now it has left my head, and so I'm going to leave it at that for now.

MR. HULL: Okay. I see Richard Gomez. Go ahead.

MR. GOMEZ: Myra, just a question. Tomorrow morning, I'm going to traveling for part of the morning, and I know there's things that I wanted to talk about with the red, black, and the gag grouper, and I don't know -- I can't remember if that was on the agenda tomorrow morning or anytime during these meetings.

MS. BROUWER: Richie, we don't have anything in particular to discuss on gag grouper or red grouper, and, tomorrow morning, we'll most likely be spending a good chunk of time talking about red porgy.

MR. GOMEZ: Okay. Then, I don't know, and maybe with new business at the very end of the meetings, and I might be able to bring something up.

MS. BROUWER: That would be fine. If there's no more questions specific to this item, let me shift control over to Mike Schmidtke. Mike, is that how you would like to handle it?

DR. SCHMIDTKE: Yes, and that will be fine, because I'm going to be clicking through and pointing at things with the mouse. Today, I'm going to be talking about kind of a follow-up to Myra's presentation, going specifically into a tool that we've developed to try to assist in this discussion about conservation and management.

If you all want to access this at a later time or something like that, and, like Myra said, we're very early in this process, but you just click the link that's here in the agenda, and it should open up for you. For this process, right now there are nine species, and they're all shown there in that left panel, and these are all being considered for this evaluation process, to consider whether they require conservation and management through the Snapper Grouper FMP.

The factors that Myra went through are listed at the bottom of this welcome page, right here, and what we did with this tool is we converted these factors into questions, to try to make this a bit more interactive and help viewers, you all, the council, any public that would try to use this, as they go through this and kind of step through and also be able to have a way of kind of tracking progress as you're looking at each of these various factors.

As Myra talked about, today's discussion is very much a broad kind of birds-eye view, and the council has not initiated any action on this, and so, at this point, we're trying to make sure that the information that we're showing them kind of matches up with what you all are seeing and what you all are experiencing on the water and within the fishery, and so that's one of the things that we want to consider today.

The overall goals for this discussion are, first of all, to introduce the functionality of this tool and kind of have a bit of a tutorial of how to use it. I am not going to go through every single portion of it, and I will try to introduce it at least in some detail, so that you can go back to it as this process

moves forward into the future and whenever the council, if they decide to initiate an action -- We can use this as a helpful thing for conducting these evaluations.

Second of all, for the goals for today, as I talked about, there is this birds-eye view, and we do have the specific species, and I will show information for each one, at least some information for each one, that we have right now, and, based off of that preliminary information, we would ask the AP if anything stands out. Do any of these species stand out, in the sense that they should not even be considered in this evaluation process, that we don't even need to put them in any type of action that the council should take, and, if there's a recommendation of that type from the AP, then that would be helpful as well.

Then, finally, before I start walking through the tabs and showing the different things that this app has in it, I just wanted to note that this is a work in progress, and this is, as Myra said, the information that we have right now, and we are still adding to this, and we're reviewing some of the information, and we're checking some of the information with state partners, and we'll hopefully be able to get some information from you all, just to, if nothing else, verify that what we're showing on the screen makes sense and is helpful for conducting this type of evaluation on these species.

The first tab, moving from this welcome page that we'll look at, is this life history tab, and what we have here is, on the left, there's a drop-down menu. You click it once, and you can scroll through and select whatever species you want to view at that time, and they are alphabetized, and so blackfin snapper is just the first one that we'll have as an example, but, as you see, you can switch off from one species to the other, and, for each of these pages, you will have a picture of the species there at the top, and then there will be information associated with it, having to do with its life history and covering topics of distribution, spawning information, reproduction, in the sense of maturity, if we have that information, any notable movement patterns or migrations. Then a fun fact, so to speak, and then age information, if we have it, and then stock status. As Myra talked about, all of these species are unassessed, and so stock status is included in this list, but just spoiling it for everybody, for all of them, the stock status is unknown.

Next, going to the factors, what we see here is there are a series of buttons, and you can walk through these buttons, and these buttons will take you through all then of those National Standard factors, and those, like I said, have been moved into kind of a question format.

Right here, we have blackfin snapper as the first species, and blackfin snapper will take a little bit longer, because I will explain the pages as I'm going through the type of data, and the other ones I will do more of a quick summary of that information, because I won't have to explain what's being seen on that page.

First of all, we have the question of environmental importance, and we have that shown here in a predator/prey table, and these would be organisms that blackfin snapper prey on, and these would be blackfin snapper predators. The prey species are ranked, and they are ranked based off of diet studies from the most common prey items to the least common. Predators are not ranked in any fashion, and this is where diet studies have observed blackfin snapper in these other fish, and, with these questions, you have yes/no buttons that can kind of guide you through this evaluation process, and I will click them. The selections that I am making here are completely hypothetical, and they have no bearing on how this will play out, but let's say, based off of this information, as

well as the life history, you think that this stock is an important component of the marine environment, and you would click yes.

When you click yes, you would get a response there, and you would also get a tally here, and you have a running tally of all of the questions, all of the factors, that you have addressed as you're going through this, and so then you can click to the next radio button there. On this screen, you have two figures here addressing the question of is the stock caught by the fishery. First of all, in Figure 1, these -- This figure will stay the same, no matter what species you click on, and this groups all of the species that are being considered to be evaluated for conservation and management, which would be either as ecosystem components or to be removed from the FMP, and I might make that label a bit more accurate, but it groups all of their total landings, both recreational and commercial, up here and then the rest of the management unit down at the bottom.

As you can see, that's a very tiny, tiny portion of the landings, and all of these species combined, compared to the rest of the fishery management unit, and individual species here are marked by the different colors, but all of the species that are being considered for conservation and management comprise 1.4 percent of the total landings in the management unit, and so that gives some context of where they sit relative to the whole unit.

Then, looking down a bit further, and I think it was referenced in one of the previous comments, about the complexes that we have within the snapper grouper management unit, but all of these species belong to a complex already. As they are currently managed, they are managed within a complex, and so this bottom figure will change based on the species, and it will show the selected species relative to its complex, and you have the recreational and commercial landings. For example, with blackfin snapper here, blackfin snapper is a very small portion relative to the rest of the deepwater complex. The other species in the deepwater complex are listed in the caption down at the bottom.

What is also in this figure is a marking of 1 percent of the total fishery management unit landings, and so, if you were to kind of place it up here, it would sit somewhere down, and I'm hoping that people can see my mouse, but it would sit somewhere down very close to zero, within that green portion of the upper graph, but you will see this 1 percent marker, and that can give the context of this individual species, relative to the full fishery management unit.

What this bottom figure is telling us is the deepwater complex as a whole is a very small portion of the management unit, and blackfin snapper is a very small portion of that, and so that kind of scales it and gives some context as to whether that stock is being caught by the fishery.

Next, considering whether an FMP could improve or maintain the condition of the stock, the way that we interpreted this was specifically in the context of a federal FMP and whether that is something that could also -- Whether it's really having an impact or something like state regulations are really having more of an impact, depending on where the stock is being caught.

What we show here are pie charts, and these pie charts show commercial, recreational, and combined landings that are caught in either federal, and federal is shown in red, or state waters, and state is shown in blue, and so there are a couple of things to pull out of these graphs. In the case of blackfin snapper, you have 100 percent -- All of your recreational landings are coming from federal waters, and about two-thirds of the commercial landings are coming from federal



waters, and so, when you combine all of that, one thing to notice here is this commercial portion gets quite a bit smaller, and so the recreational landings, in this sense, are likely outnumbering the -- Well, they are outnumbering the commercial.

What you see from this combined -- What you can interpret from this combined portion is that, if this species is in need of conservation and management, then most likely the federal FMP would be the best route to actually have that be efficient.

Then, moving to the next set, and this is one of those grouped portions, where there's quite a bit of overlap between the questions and the information that could be used to answer them, and so we have whether the stock is the target of a fishery, its importance to various types of users, as well as to the nation or the regional economy.

Here, we show landings that are recent averages, and I apologize that I forgot to indicate in the previous slides that all of that information, as well as this information, is based off of what I'm going to be referring to as recent landings, and that's an average of 2016 through 2018, and that was the information that was available at the time that the SSC made their recommendations on these species, and so just a brief note there.

Within this table, we have recreational information in the top three rows and commercial information in the bottom three, and what we see here is targeting -- First, for the recreational, targeting information for blackfin snapper, as a percentage relative to the rest of the snapper grouper management unit, and what we see there is there were no targeted recreational trips for blackfin snapper, since it's at that zero percent. Then an average of the recreational trips that landed blackfin snapper, and what it looks like is only one recreational trip over the last three years is estimated to have landed blackfin snapper. As an average, that would be divided down, and it ends up with a third there.

Then, finally, the percentage of fish that blackfin snapper accounts for on the trips where it's landed, and so, on that trip that landed a blackfin snapper, it constituted one-third of the fish that were on that trip, and so now, looking at the commercial information, we have this species' value relative to the rest of the management unit and then the average commercial trips with landings of blackfin snapper and then, finally, the percent revenue on those trips where a blackfin snapper was landed, what percentage of the revenue they accounted for, and what we can see here is -- You will see, from the context of the rest of the tables, that fifty-eight trips per year that had some landings of blackfin snapper isn't a very high mark at all, when you compare it to what else is being landed within this management unit. In addition, this is a pretty small portion of the revenue, in terms of commercial trips that harvest it. Answering a couple more of these questions, just kind of filling them in, so that you can see what it looks like when you have them all filled in.

Next, the questions about conflicts among user groups, and, for this first question, I am going to go ahead and spoil that for everybody as well, for the sake of time, and the only species that we have information on a conflict among the user groups, and this is a potential conflict, is cubera snapper, and that one is harvest that occurs between both divers and rod-and-reel fishermen, but, if there is other information that could be obtained from you all, as far as competing interest for a certain species, then that would be something that we would be interested in learning more about and following up on kind of in the aftermath of this meeting.

Then, considering the economic condition of the fishery, could an FMP produce more efficient utilization, and most of these species don't have a whole lot of economic value as it is, and so, whether there is an FMP or not, it doesn't appear that an FMP is going to impact the economic value of these species, because it's not very high to begin with, and so that's just another spoiler. I'm not going to be running back through this button for the other species, just because they're similar across all of them.

Next, looking at the growth of the fishery, in talking about a developing fishery, when we looked at this information, we took it more from a long-term perspective and first determined is there a growing fishery for this stock, and so we took it back to the 1980s for each of these species, to see what is their harvest commercially and recreationally, as well as the commercial value, to see if there is any noticeable trend for any of these.

In the case of blackfin snapper, we don't really see hardly any commercial harvest, and that would be indicated by a light-blue bar, and we see maybe a little uptick here at the end, but it's at such a low value that it's not something that seems to be hugely concerning, and that little uptick led to this increase in the line, but note the scale here. We're talking about a \$2,000 fishery, in the case of blackfin snapper commercial, and so all of those things just to keep in mind as we're going through, and note the scale, and note the height of these, and, in a lot of these cases, because of some of the variability that gets associated with MRIP, you have these large spikes here that occur, and they occur throughout a lot of species that don't have very regular recreational harvest.

We will see that pretty frequently with some of these species, and we see one of those big spikes here with blackfin snapper, and that can have a tendency to really skew the scales, just to make sure that those points are shown, but that's just something to keep in mind as you are going through and evaluating each of these species.

I am just clicking the button, and then, finally, looking at existing management, and we looked at where landings are being caught, in terms of federal versus state waters, but the way that we kind of took this, from an informational standpoint, is are there other entities that are managing this species that have some form of regulation, such that, if a federal FMP was removed, or if this species were placed into an ecosystem component status, that there would still be other kind of mechanisms in place that could aid in the management.

We filled it out as best we could, and we sent this out to our state partners, and we've not gotten responses from all of the state partners just yet, and we're still waiting on a few, but we have this filled out as much as possible, and this is going to be another one of those pages that, for the sake of time, I am not going to go back over today for each species, but it's something that can be considered in potential later steps of this process.

As you get through all of those questions, the thing you will notice is that, once you answer all ten of the questions, this tally right here is going to go bold, and that's your indicator that you have answered all of the questions, and these no responses that are being tracked -- There is no threshold number for recommending a species for ecosystem component status or for removal from the FMP, and there is no threshold number for any of those, and this is more of kind of a way to help you all track your progress as you use this.

I mean, it wouldn't probably lend itself towards, well, if this species kind of checks all the boxes, then it would make sense that it would not be in need of conservation and management, and it could be met with one of these other actions, and, if it's really much lower, then there might have to be some more conservation about it, but it's really kind of a relative gauge, and it's not meant to be a hard-and-fast rule that, if it's six or seven, then you take it in any particular direction. I know that that was a lot of information, and I guess, initially, if it's okay with you, Mr. Chair, I would pause and ask, first, if there are any questions about how to use the tool itself.

MR. HULL: Certainly. Go ahead, and, if anybody has a question about how to use this tool, raise your hand.

DR. COLLIER: Rusty Hudson has his hand raised.

MR. HUDSON: Yes, but it's been raised since earlier in the presentation, and it's not about the tool. Can I make a comment anyway?

MR. HULL: Why don't you wait on a comment, Rusty, and we'll address this tool right now. Thanks.

MR. HUDSON: Okay. I had two comments on that.

MR. HULL: It sounds like there is no questions on how to use the tool.

DR. SCHMIDTKE: Okay. Then kind of the next question, and, if it's okay with you, Mr. Chair, I introduced the information for blackfin snapper kind of as I was going through that, and so, if there is any question or discussion relative to blackfin snapper and its inclusion in this process moving forward, then I would be interested to hear that as well.

MR. HULL: I can't see any hands raised right now, and so I would rely on staff for that, but I think there could be a lot of questions here, overall, but, as far as the tool, questions on the tool and what you stated as far as blackfin snapper, I mean, it looks like that blackfin snapper -- We have -- I mean, to put it bluntly, we have a lot bigger eggs to fry and things to worry about, and that's why we're doing this, than to try to spend a lot of money assessing blackfin snapper and managing it, and maybe it is a better choice for ecosystem, using your tool, and I see that, and I appreciate it. Does anybody else have any questions on the tool?

DR. COLLIER: Bob Lorenz has his hand raised.

MR. LORENZ: Thank you for acknowledging me. I did not have a question on the tool. I raised it with respect to a question that I would have on management. If we were to go through this, and there would be species that would be recommended for, I will say in quotes, no management, and I guess no fishery management plan, and what does that mean? Therefore, once that is done by us, or it's done by the council, how would you get a fish managed if suddenly it became evident to some people that it needed to be managed?

We're not just going to throw this species out there to never be looked at, I would hope, and some of them that I've seen on the list, like cubera snapper, it's looking like it's getting ever important to recreational fisheries, from the pictures of them in magazines, and so I would ask that. If our

recommendation is don't manage it, well, how do you start to manage it, and then, if you're going to say manage it in states, of the current list that's out there, with the exception maybe of one fish, maybe the margate, I think -- I'm pretty sure, if you get say north of Canaveral, or certainly the states of Georgia and South Carolina and North Carolina, with the exception of maybe a brief spot near Hatteras, these fish aren't going to be caught in state waters, and so why would the states be managing it in any way, unless the federal managers state what it should be, like we see in South Carolina and North Carolina?

This is kind of reminding me as one of our options is going a little bit of the way the Gulf did, but the Gulf then had state waters out to nine miles, and we only have about three, and, in my area, you have -- I wouldn't go out more than about fifty feet of water, thirty to fifty feet of water, and so how does that all fit? I'm a little nervous about saying, well, don't manage it, and put it to the states, but like my state is not catching them in state waters, and so when do you come back to looking at these for federal management?

MS. BROUWER: Jimmy, if it's okay with you, I will try to address Bob's question.

MR. HULL: Perfect. Go right ahead.

MS. BROUWER: Thank you, and thanks for that question, Bob. To answer your question about how the council would go about deciding whether something needs to be managed, that's exactly this process, and so that's why we're going through this exercise, to make sure that we've covered all of our bases, as far as all these various factors, including state management for these species, and then make the determination. That's also the reason why one of the options is to keep it within the FMP, to satisfy these ecosystem objectives that I talked about earlier.

It's kind of an exhaustive process, and the council needs to build their rationale along the way before anything can happen, and so that's why we're going through this right now and asking for feedback from you guys, who are out there interacting with these species, so the council can have extra information besides what Mike just showed you that we've been able to gather for these species, and so they will be able to make a much more informed decision, and, as you know, this will still have to go through a management plan amendment process, which is lengthy, and there's a lot of opportunity to analyze information and get public comment on it, and so I think that may have addressed your points there, but I will leave it at that for now. Thanks.

MR. LORENZ: Myra, if I could ask maybe one thing, and we can talk about it a little later, maybe at the end of this, and that is, I think for a lot of us, I would be very interested, for many of these things, to have a little course on what the South Atlantic Fishery Management Council is going to call an ecological management system, or I've been familiar with the Atlantic States Marine Fisheries Commission ecosystem-based management, and that was brought up with things like the menhaden and the river herring, and they started to put more of a focus then on things that were of little commercial value.

Now, in the case of the menhaden, it was one single -- The State of Maryland came and said, well, we need to conserve them for our striped bass, and New York and New Jersey said that we need to save them for our bluefish, and, low and behold, they started to consider those little fish as important to the ecosystem, and they even found, when they reduced the menhaden catch, that they were all showing up, and things like that, two miles from New York City, and so a guy like me,

who has played over there a lot, with ecosystem-based management, I am looking at some of these species, or possibly one, as it's kind of a bait.

Yes, it's important for the ecology, but some of these others are in deeper water, and they have value to some sort of fishery, commercial or recreational, but I wouldn't know to figure how are they important to the ecological environments on any one of those species, and so I wouldn't mind kind of a little course on what you're going to call an ecological management system, because, to date, for the South Atlantic, I have always seen it more as a species type of management system.

MR. HULL: Myra.

MS. BROUWER: Thanks for that, Bob. I guess I would say that the council has been engaged in discussions of ecosystem-based management for a number of years, and there has been other initiatives at the council level, under habitat, and there's a Habitat and Ecosystem-Based Management Committee, made up of council members who discuss those things, and there is initiatives to develop a food web model for the South Atlantic, the entire South Atlantic ecosystem, that can be -- That can inform management decisions at that level, but you're right that our council has -- Because there is not a whole lot of information to conduct that kind of a modeling exercise for an entire ecosystem, they've been focusing more on a species-by-species type of an approach, but it is something that continues to be discussed at the council level.

As far as providing any kind of an information or tutorial of that, I think that would be an interesting exercise, and I will pose that to the council and staff, and, I mean, it's something that we also kind of grapple with, what exactly does it mean to conduct ecosystem-based management, and it can mean many things, and I think this approach of considering whether a species needs to have direct intervention to manage it, from a management agency, is part of that approach, considering what is a forage species and that sort of thing.

The council recently designated two species under the Dolphin Wahoo FMP as ecosystem component species, and so I interpret those actions as actively engaging in an ecosystem-based management type of approach, but I don't know that there's a very concrete way to describe such an approach.

MR. LORENZ: Thank you, and, just in short, the point I wanted to make is so many of us, when we looked at and talked of ecosystem-based management, it was to really consider the non -- The species of no commercial value of any type, and, to that, I mean any kind of fishery, and it was really more for bait and things, all the fisheries, and there are a few species on this list that certainly fit my idea of that.

MS. BROUWER: Jimmy, I think I'm looking at the time, and I'm thinking -- I was going to suggest that we let Mike go through the rest of the species, and maybe hold questions for a little bit, and, since we were actually supposed to wrap things up around 4:00, I don't want to keep people too far into their evening, and perhaps we could get through the rest of the information and then get back to this in the morning, once the AP has had a chance to kind of mull things over. You can look over this tool on your own, and it's online, and you can play around with it as much as you like, and then maybe we can continue this discussion in the morning. Right now, I see that both Harry and Rusty have their hands up.

MR. HULL: That sounds perfect, Myra. Go ahead, Harry, and then Rusty.

MR. MORALES: I did have a chance to play around with the tool, and I thought it was pretty phenomenal. I hadn't really given a whole lot of consideration to eco-management, but, if that's the direction that we're headed in, then, managerially, I don't know how you couldn't take into consideration the various species that are there, and we've already had conversations about the red snapper and how the black sea bass are getting decimated now as a result of that, but, at the end of the day, if we're going to have effective management, we're going to balance all of these, the competing interests.

I scratch my head, but, in the Hilton Head area, we have the Waddell Institute, and they really did a phenomenal job at bringing back the cobia. When the cobia were initially out there, there was no limit on how many cobia you could catch, and so these guys were just slaughtering them, just like the mahi and everything else, and so, in my opinion, and I don't know -- I can't speak for commercial fishermen, but, for recreational, I mean, hell, if there's no limit on something, you just keep going, and, at the end of the day, with the increased technology, and with the increased boating, and the increased pressure, everything is going up, and you've got no choice but to put limits on things, so that you can sustain the fishery, regardless of what the fish is. That's my point.

MR. HULL: Rusty.

MR. HUDSON: Early on in the presentation, of course, for me, and my fifty years, I don't really recall mixing up with blackfin snappers, recreational or commercial, out of Daytona, or even when I was fishing in the Keys or the east Gulf, but maybe I was in all the wrong places, but one of the things on that deepwater complex is the sand tilefish is actually inshore of the big reds in most places, and it's not like the blueline or the golden tilefish, and I believe it's subject, or has been subject, to removal from that classification.

The last thing is that recreational spike, around 2011, right after the red snapper closure year-round, that looks like an outlier to me. It's probably expanded by whatever intercept there was. Otherwise, the ecosystem-type monitoring and ecosystem management is really subjective when you've got such a small percentage of those animals interacting, or being interacted with, by any of the fishing sectors, and so thank you.

MR. HULL: Okay. Thanks a lot, Rusty. Back to staff.

DR. SCHMIDTKE: Thank you, Jimmy. Just kind of in response to Rusty's comment there, I mean, the spike that you're referring to there -- We'll see a lot of them with this species, because that comes with any species that doesn't get caught a whole lot and doesn't get caught with a whole lot of regularity, because the recreational samplers aren't able to pick it up like that, and so you get that one hit, and it gets expanded in that way, and so, yes, there's a pretty good chance that it's an outlier, and I'm just letting you know that we'll see probably a few more outliers as we go through the others as well.

MR. HUDSON: Yes, I agree with that, because of that rare-event status, and it's like schoolmaster and other types of animals that we have seen over here around the mid-Florida Atlantic east coast, but the Keys is a different world too, and right up -- When you go from Port Canaveral to Cape Hatteras, you have point-to-point on the west eddies of the Gulf Stream, and it's got this wide area

that creates a whole different scenario, and there is places there in South Carolina and Georgia that we used to find that was like -- One of them was called the Rose Garden or something, and it was like the nature of fish that you just didn't see anywhere else, and so I understand all that. Thank you.

DR. SCHMIDTKE: Okay. In the interest of time, since we're bumping up against the end of the day, I think, if we're going to push at least a little bit of the conversation to tomorrow, it may not be as well to go through each species right now, just because that's going to take a little bit, but I would encourage the AP, maybe in the aftermath of the call, or leading up to tomorrow, to go into the tool and click around in it and look at the couple of different species in there.

I have heard a couple of comments, and I'm really just going to hit a couple of highlights here, because I've heard a couple of comments, and we've received some internally, looking at cubera and then, from the conversation today, margate, as well as some of the things we've talked about with yellowedge, and so I just wanted to hit those species really quickly, and then I can kind of leave it at that until we pick up in the morning.

Cubera snapper, as far as its landings go, from that 2016 to 2018 period, this is where it sits relative to the rest of the snapper complex, and the snapper complex is dominated by gray snapper landings, and so that's what you see kind of pushing up the mark relative to cubera, but it's just short of that 1 percent line relative to the total landings of the management unit.

Looking at where it's caught, it's caught, from what we know, in primarily state waters, and there's a commercial fishery that operates primarily in federal waters, but, when you put that in perspective of the recreational estimates, most of the landings are from that recreational state-water fishery, and there is, very likely, some influence of that when we get to the fishery growth figure. There is likely some influence of that, of expansion of recreational harvest estimates, and so that is a factor to keep in mind as you look at this.

Considering the targeting, there is not a huge amount of targeting on cubera, and there is actually -- It's not zero, and it's more than zero, over the last three years, and there was a trip -- There was at least one trip that was registered targeting cubera snapper, but it's still a low number of trips with recreational landings. When it was landed on a recreational trip, it constituted about 40 percent of the fish that were landed there. Then, looking at it commercially, less than a tenth of a percent of the commercial value, relative to the rest of the management unit, and, on trips where it was harvested, it constituted about 4 percent of the revenue for those trips.'

Skipping down to that kind of longer-term look, we see, with cubera, that a lot of the spikes that have been discussed and we'll see with these species, because of the sporadic nature of their recreational harvest and the expansion of that, the commercial value is kind of moving around, and it seems like there's a little bit of an increase, but, again, considering the scale, it's not a huge scale, and it's not a huge commercial fishery relative to cubera.

Skipping then next to margate, it's a similar type of information, and margate is within the grunts complex of the management unit, and it sits pretty low relative to the rest of the grunts complex. The landings there are dominated more by tomtate and white grunt, and it sits well below that 1 percent line for the management unit and total landings, and that 1 percent line isn't necessarily

the defining factor. It's just giving some scale, giving some perspective, relative to everything else that's being managed along with, in this case, margate.

Considering where this species is caught, it's caught almost entirely in state waters, and there is 100 percent commercial, but the commercial is very small, when you compare it with the recreational, although, again, remembering that there may be issues with the expansion, and so you've got to balance this with some of the other information that's available.

Considering targeting information, there are -- Relative to some of the other species that are being considered here, there are a higher number of commercial trips that target margate, and there's not much revenue generated, necessarily, but there are trips that land margate. Not necessarily target, but they land margate. Recreationally, no targets, and it's pretty rare landings during that three-year time period, but, when they are landed, it seems that they constitute a decent number of the fish that are caught on that trip, at about 45 percent there.

The fishery for margate doesn't seem to be showing really growth here, and we have kind of one those spikes there that happened in 2016 for the recreational fishery, but the commercial fishery is hardly even showing up on this scale, and the commercial value is sitting right around zero for that fishery.

Then the last one that I am going to point out today is yellowedge grouper, and we've kind of -- When staff looked at this data, it was one of the ones that kind of stood out, and we've gotten some comments that it's one that may merit a bit more discussion, and so yellowedge, relative to the rest of the deepwater complex that I talked about before -- The deepwater complex isn't a huge amount of landings, but yellowedge is one of the more frequently landed species within that complex, and it is caught in federal waters, almost exclusively, and there are a very small amount of landings there from the commercial fishery in state waters.

Then, looking at the targeting information, there's not a lot of -- Recreational trips don't typically target it, and it's not a very frequent species landed, when it comes to the recreational fishery, but, looking at the commercial fishery, it seems that, kind of in the perspective of some of these other ones that we're looking at, it seems to hold a little bit more commercial value and constitute a little bit more of the percent revenue when it's landed. Also, it's a noticeable kind of higher amount of trips with landings, on average, during that time period.

Then, finally, growth of the fishery, this is kind of a unique situation relative to some of these species, in the sense that it is more heavily commercially fished than some of the other ones, a lot of the other ones, and most of the harvest estimates are going to be from the recreational fishery, but yellowedge has what seems to be a more prominent commercial component, and we see it -- As it's coming into the more recent years, the commercial landings, that most people view to be a bit more accurate than some of the recreational estimates, they seem to be showing some level of increase in the recent years, as well as kind of commercial value following in kind with that.

Mr. Chair, I think that's all that I can hit, because I don't want to keep people longer, and I guess I would encourage folks to, again, look at some of these other species and click through and look at the information and, if we want to discuss it further tomorrow, that's something that I am available for, at least.



MR. HULL: Thank you, Mike. That was very, very good. It was a lot of information, and it was very interesting, and I know that we're going to talk a lot more about this, and so we're definitely going to need you here tomorrow, because I have some questions and some comments, and I know everybody else will also, and so I appreciate that, and hopefully everybody will take some time to click around on this tool and get a little bit familiar with it. I'm glad you went to the yellowedge, because that's one of the species that I have some questions about also. Myra, what time tomorrow do we want to crank this up again? 8:00 a.m.?

MS. BROUWER: Well, I mean, I see there is at least one person that has their hand up, and so I was going to suggest that -- I don't mean to drive anybody away, and we can stay here as long as you all want, but I was just trying to be cognizant of the time, and it's a little bit -- It takes a lot of energy to focus on some of these things in this kind of an environment, and the other thing that I wanted to point out, and I will bring up in just a minute, after Mike is done with his part of the presentation here, is the link to this tool is included in your agenda. That's how you get to it. It's right at the very top of the agenda, and Mike is showing it right now, and so the top one is the red snapper that we looked at earlier, and then that other link is the tool that he just showed you. Back to you, Jimmy.

MR. HULL: I don't know who is -- I can't see the hands, and so, whoever has got their hand up, if you can make it real concise, go ahead, and then we're going to talk about start time for tomorrow. Go ahead.

DR. COLLIER: It was Tony Constant.

MR. CONSTANT: First, Mike, I appreciate it. It was a lot of data, and that was great, and I just wanted to make a quick note on cubera snapper. When red snapper was first closed, and we were targeting our charters, we directly went to targeting that fish. Between Edisto and Savannah, we have a good number, it seems like, and so they were directly affected by the snapper closure. Me and another captain, in particular, did target those fish quite often, and they made for a good eatery for the charter captain, but, that said, in my area, I feel that that fish does need some management. That's enough.

DR. COLLIER: Then Bob Lorenz had his hand up, too.

MR. LORENZ: Thank you, Jimmy. Just for one minute, I would just like to ask everybody here, and something that bothers me that I just want to think about, and I am a little unsure of what species don't need to be, quote, unquote, managed, but I would ask every one of us -- In using this tool, one thing that comes across to me is this is a rearview-mirror view of what's been going on, and there might be a tendency for us to think about how should we manage based on what has happened, and I would like to ask all of us, regardless of what you fish for or what your fishery is, to please try to think of this as going forward of where this might go, because what happens with some of these species, if they're not really managed or in the FMP and a fishery turns on.

One can I bring up as an example over the past twenty years is swordfish, and this could happen to any of these species, and that was just stated with cubera snapper on the recreational side, and this could explode, as some people are pushing and teaching how to catch these things, but I think we should try to think forward as well as backwards on the recommendations. Thank you.

MR. HULL: Thank you, Bob. Okay. Back to you, Myra. So we can plan for tomorrow, if you will let us know what time you would like to get started.

MS. BROUWER: I think 8:30 would be fine, if you would like to get started then, and we'll get the webinar going at 8:00, to make sure that we can troubleshoot any audio issues. If that's okay with you, we can proceed that way.

MR. HULL: That sounds good to me, and so you'll be available at 8:00 to get everybody signed-in, and we'll officially start at 8:30.

MS. BROUWER: Sounds good to me.

MR. HULL: All right, guys and gals. We appreciate it. Go ahead.

MS. BROUWER: I'm so sorry, but Randy McKinley just raised his hand.

MR. HULL: Go ahead, Randy.

MR. MCKINLEY: 8:30 is fine with me, but I wrote down, somewhere on your agenda or something, that it said 9:00 to 4:00 on Thursday and 9:00 to 12:00 on Friday, and so somebody that stepped away -- You might want to let them know or either change that time.

MR. HULL: Well, maybe, Myra, you can just send out, if you don't mind, an email to everybody and just say, okay, the times tomorrow -- We'll be signing-on at 8:00 and begin at 8:30.

MS. BROUWER: I would be happy to do that, Jimmy.

MR. HULL: Thank you very much. With that, we're going to adjourn for today, and good job, everybody. Thank you very much, and let's get started again tomorrow morning. Have a good night.

(Whereupon, the meeting recessed on November 4, 2020.)

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NOVEMBER 5, 2020

THURSDAY MORNING SESSION

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The Snapper Grouper Advisory Panel of the South Atlantic Fishery Management Council reconvened via webinar on November 5, 2020 and was called to order by Chairman Jimmy Hull.

MR. HULL: Good morning. I think we're good, and we can get right back in with the presentation, I suppose, and I am ready to go when you are.

MS. BROUWER: Sounds good. Good morning, everybody. I hope that you guys had a chance to go over the little tool that Mike Schmidtke presented to you yesterday. What we figured we would do this morning is get Mike back on the webinar and answer any questions that you all may have and start the discussion there.

DR. SCHMIDTKE: Kind of getting back into the discussion that we started yesterday and held overnight on these species that are potentially being evaluated for the need for conservation and management, hopefully you all had a chance to kind of click around the tool and look at some of the characteristics of the different species, and I think one of the things that we wanted to do was just kind of open the floor for were there any things, any species, any pieces of information, that stood out as we should talk about this a little bit more before this species moves forward with any evaluation.

Going off of some of the conversation that was had yesterday, Myra and I kind of talked about how we had presented these different designations, this ecosystem component or this removal from the FMP, and one of the conversations seemed to steer in the direction of, well, what if one of these species that's not being harvested right now all of a sudden becomes a very prominent targeted species, and what would happen there, and I think that a couple of things to keep in mind as we go through further discussion today is, right now, very few of these species, with maybe one or two exceptions, and we can talk about those a bit further, but very few of these species right now are approaching or nearing any type of limit that's already put on them.

Some of them are in species aggregates, and we're barely seeing them, and you probably saw that as you were going through some of the landings trends for several of these, that they are hardly being landed at all, let alone not being targeted, and kind of another consideration to have in evaluating this need for conservation and management is, at the core of it, Magnuson requires that all of the managed species within an FMP be limited -- The harvest be limited by an ACL.

An ACL requires setting of what that limit is, and it requires enforcement of that limit, and one of the -- Kind of a question that goes along in this frame is is it worth the effort and expense money and all that put in to set a limit on the annual harvest of these species, and some of them are included in complexes, some of which these species are contributing very little to that complex limit as it is, but that's just something to keep in mind, and it's a consideration to have as you all have your discussions today, but, with those two ideas just kind of put out there, I would turn it back over to you, Jimmy, just to open the floor and see if folks have questions or if they have species issues that they would like to talk about a little bit further.

MR. HULL: That's perfect, Mike. What you just stated is kind of what I got last night in messing around with this a little bit, and the fact that most of these -- I didn't go through every one, but, the ones I did, they're either in a twenty-fish aggregate, or they're in the shallow-water complex, or they're in the deepwater complex, and so that means that they are limited harvest by an ACL, which means, as you just stated, there is lots of responsibilities to come up with that ACL and try to track them and so forth, and there's not enough landings to make it worthwhile, and so that's where I was headed.

It's like what do we gain by moving these out of the complex or an aggregate, and so that's what you gain. You gain more resources to concentrate on more valuable fisheries and things that are pressing, and so that helped me out a lot, what you just stated, and messing around and clicking

around and seeing how they are managed now, or they're managed by the state, with most of the harvest in the state, and so there is reasons to move it to the ecosystem component, which would kind of be like a parking lot, so to speak, for it, to move it over until -- You will still have an idea of where it's at and look at it, but you won't have all of these responsibilities of an ACL, and so I got a lot of that, and I think we can develop a -- From my point of view, we can develop a reasonable recommendation to the council on what we think they should do, and so thanks a lot, and I'm going to open it up now. Andrew Mahoney, you are up.

MR. MAHONEY: I agree a lot with what you said there, and I think that regulating something that's hypothetical probably isn't in our best interests right now and that any funding we have should be used to do studies on more important fish to our communities, and that's all.

MR. HULL: Thank you, Andrew. Randy and then Robert.

MR. MCKINLEY: Jimmy, you and the fellow before both reinforced what I said, and I sort of had a comment that I wanted to make yesterday that we didn't get to, but it falls right in there. I mean, when you're looking at these as an overall, with the exception of the cubera and the yellowedge, and I'm excluding those, but these fish are a small bycatch, and they're probably not very aggressive, and most of them are small fish, and the council has enough to do with the more important species.

Commercially, when you start catching these kind of fish and stuff, that means your triggers and your b-liners and your pinkies are not feeding, and you're not going to sit there and catch them, and so, for any kind of concern that it would become a fishery, it's just not going to happen. You're going to pack up and leave, and, for recreational, it's part of an aggregate, and that's all it needs, but the cubera and the yellowedge probably needs more discussion, and that's it.

MR. HULL: Go ahead, Robert.

MR. LORENZ: Thank you to Mike for making things a little clearer, because I had some concerns on what management would be about, and I was not clear, and so I just have two remaining very small questions. Coming from the recreational side, I'm not always up-to-date every moment, and I forget, without going back to documents, on what goes on for commercial, but I'm very comfortable with the explanation, and I realize that, for the recreational anglers, they will go in an aggregate, like the reef fish we have, the twenty fish and five fish of any one species, and I'm comfortable with that.

I was unsure about commercial, and, for those of us that aren't commercial fishermen, is there any commercial aggregates, and that would be one question, and question two is, if a new species begins to be commercially harvested -- I will use the example of if somebody starts to harvest lizardfish, for example, does that show up -- Recreational anglers don't report, and the commercial do report, and so are the commercial reporting everything? If commercial fishing starts harvesting these species, and there's a fish house that likes them, is that picked up instantly? Thank you.

DR. SCHMIDTKE: I think that, from your first question, as far as whether there is any commercial aggregate, I would have to look towards state representatives. As I pointed out yesterday, we don't have all of the regulations, the current regulations, defined, just because we're still corresponding with some of them, and we haven't heard a whole lot on the commercial side, if there are any form

of commercial aggregates, and so I would have to look, and we have a couple of council members that are from the states on now, but, if we don't have those accounted for, I could also try to look that up and follow-up on it and get back to you before this process gets too far ahead.

For your second question, there would be a record that the species was caught. It would still be included in the data collection, the landings monitoring, and that still happens. That happens as a separate process from the FMP, and it's not strictly FMP species whose harvests are recorded in commercial, and so there would still be a record of the catch. I think that, if there were a significant increase to the catch, particularly here in the South Atlantic region, that is one thing that the council and council staff -- That's something that we would very likely be looking to the AP members to let us know.

Like, if you're starting to catch a species that you haven't been catching a whole lot of before, and you want to make sure that the management is set up for it, that's something that we would look to you all, as you all are kind of our eyes and ears in the fishery, out on the water or in the fish houses or wherever, and so I think -- I hope that answered your second question, and it looks like Mel is on the list, so that he could potentially speak for South Carolina.

MR. LORENZ: Thank you, Mike. I feel good about it, and I was pretty sure that the commercial catch gets reported, and so I'm very comfortable that, if something starts taking off, that we would know about it, but I didn't know for sure, if it's an unmanaged species. Thank you.

MR. HULL: Robert, I was -- Before we go on to David Moss, I was just here at my desk, and so I was looking at my paper logbook form, and many of these species are listed on the logbook form. Not all of them, and coney isn't, but a lot of these are already on the logbook form, and so they would be recorded. If something is paid for them, it will be recorded. David Moss, you're up.

MR. MOSS: Thank you, Mr. Chairman. Just to echo what's already been said, really, with the exception of cubera, which are, to my knowledge, down by me, the only ones that are really targeted, and the rest are part of sort of a deepwater complex, and they should probably be managed as such, as part of like a group FMP, and I don't think any of these are targeted, necessarily, and certainly down by me. Like I said, I know cubera is the outlier, and people do go for specifically cubera, but the rest are part of -- You know, when you're deep-dropping, you hope to get some of the rest of what's in there.

MR. HULL: Okay. Jack, you're up.

MR. COX: Jimmy, I agree that -- Up here on my end, off of North Carolina, we interact with the margate more than anything on the list here, in the group, and we probably -- Our commercial boats will come in or ten or fifteen pounds a trip, a four or five-day trip, and so we do interact with them, and we do have them on every catch, just about.

The cubera are rare, and each boat will probably have one or two a year here, and the yellowedge is a very high-value fish. The guys off of South Carolina will probably interact with it more than anybody, when they're out fishing with their longlines and going after the golden tiles, but the yellowedge is the one that I'm most concerned about, because it could be easily targeted, especially with that particular gear, and it's a high value fish. It's a potential seven-dollar-a-pound ex-vessel price on that fish, and so, as far as grouping together in an aggregate, I think it would be fine.

I think it needs to continue to be -- You know, collect data on the fish, just like we're doing, but I would certainly pay attention to the yellowedge, and I maybe would pull that out of that grouping and continue to try to follow that at some point. I just don't know what the landings are like for the guys that are down there fishing for that deep stuff with those longlines, and they're going to interact with them more than anybody, the yellowedge. Thank you.

MR. HULL: Thank you, Jack. Mel.

MR. BELL: Thanks, Jimmy, and I was just weighing-in on Bob's question, and you all answered it. Basically, I can speak for South Carolina, and our system is set up so that any product landed for commercial purposes would have to be reported, and so, if it was lizardfish or pearly razorfish or whatever it was, we should pick it up, and so we would be able to detect a trend if a fishery increased or a new one started, at least from our perspective.

MR. HULL: Thank you, Mel. Back to you, Myra.

MS. BROUWER: Thank you, Jimmy. Again, I'm just following up on Bob's comments there, and, basically, if a species starts showing up in the landings a lot, and there starts being concern that perhaps it warrants management, then we would go through this same exact process to determine whether a species needs to be brought into the FMP, and so the same exercise we're doing right now. Also, I wanted to remind everybody that, as Mike said, the AP can make recommendations as well, and I do remember, several years back, the AP had recommended that African pompano be included in a management plan, and so certainly, as Mike said, you guys are our eyes and ears on the water. Thank you.

MR. HULL: Thank you, Myra. I think that we should come up, as the AP, together with some type of recommendation for the council, once Mike is done and we get through this discussion. You know, obviously, there are a couple of species here that I think most of us are going to agree need to probably stay in a complex, or in an aggregate, and then there's many of them that the council, just like we looked at, are going to use this tool and say, yes, we need to move these out of here and concentrate on the ones that matter, and so anybody else, or back to Mike. I don't see any hands, and so back to staff.

DR. SCHMIDTKE: I think, at this point -- I mean, I've heard cubera as a species of concern, and I've heard yellowedge. Margate has been talked about as one of the ones that gets seen, and so I think, starting with going through each of those three, and we could have a more focused discussion on each of them, and so I'm just going to move over to the cubera information, and I'll initially just pull up the long-term landings, but, if you all need anything else visual on the screen, to aid in the conversation or something like that, then feel free to please ask for it, but I would pass it right back to say that you all can have your discussion on whether you think cubera should continue to be managed within the FMP or moved -- Be considered and evaluated to be moved into some other status, potentially.

MR. HULL: Mike, on the existing management, could you click to the existing management on cubera? If you went on the council regulations page, we see that Florida state waters is managed under the ten-fish under thirty inches per harvester included in the aggregate, and it has some -- There is definitely some management, and then, on the commercial, state waters is no more than

two cubera, and so it's definitely controlled in Florida. Georgia doesn't have anything in the state waters, and South Carolina has some management in place, and the same in South Carolina and North Carolina. If you click on the council regulations page, please. It is under an annual catch limit, and it must be in an aggregate, and I'm not sure.

DR. SCHMIDTKE: It's in the snappers complex aggregate.

MR. HULL: Okay, and so we've got gray snapper, lane snapper, and cubera, and, as far as a trip limit, commercial trip limit, or size limits, there is no trip limit, but there is twelve-inch total length, and so there's actually no limitation on the trip on it, but it is in that aggregate, which has an ACL, and, as long as they stay underneath the total ACL for the aggregate, that fishery will remain open.

I know that we don't see a lot of cubera here off of northeast Florida, coming into the fish house, and, when I do see it, it's from a diver, and occasionally hook-and-line, but, when we do see most of it, it's from a diver, and it's a really big animal, and so I will open it up for discussion. Andrew Fish.

MR. FISH: Can you go to the landings of the cubera, because that was -- I mean, I'm a diver, and I'm a diver for most of my life, and, when we were diving the most, we would shoot maybe five or six a day, and, in the harvest that was thousands of pounds, and that's 10,000 pounds, if I'm reading that right, and I just find that hard to believe, but, also --

MR. HULL: That's blackfin snapper.

MR. FISH: Okay. What I wanted to say was cubera is also a nickname for gray snapper, and, for the longest time, people called them cubera, and I have even seen, in the fish houses in North Carolina, where they will write down gag grouper as black grouper, and I guess my point is I find it hard to believe that -- Or I don't think that the cubera snapper is landed in any kind of quantities, commercially or recreationally, at least from Sebastian all the way up to North Carolina, and that's just my point. Thanks.

MR. HULL: Well, I think that's good input, and, looking at this, on the -- It says that potentially, in 2017, there was 400,000 pounds of cubera harvested, and then it shows the value of roughly \$11,000, and is that right, Mike?

DR. SCHMIDTKE: Most likely that 2017 recreational value is -- It's probably some level of expansion issue with MRIP. The data seem to indicate that cubera are not kind of -- I missed the name of who spoke just now, but kind of what he was saying, that there's not a huge, huge quantity. I mean, considering the targeting information, when you look at recreational trips, if you're only talking three trips a year, it doesn't really add up to three trips a year would lead to that level, but that's the estimate from the recreational data, and so that's kind of one of those places where we've got to keep in mind the caveats of some of the recreational harvest estimates, but the commercial harvest seems to line up pretty well with what was stated, and it barely shows up in most years, and, yet, to have a commercial value of somewhere between 10,000 and 15,000 pounds, at the most, that isn't really a huge fishery, commercially.

MR. HULL: Okay. Thank you. Randy McKinley, you're up.

MR. MCKINLEY: Thank you, Jimmy. I agree with Jack. Commercially, in North Carolina, we don't see them much, but I would be more concerned, and there's such an increase in diving and free-diving, especially around the Frying Pan Tower and stuff, and these guys target the trophy fish, and I know I've seen pictures, recently, that they're getting them, and so I think there should be something on recreational, to where they can have ten fish or so, and they probably just need one or two. That's all I've got.

MR. HULL: Thank you, Randy. David, you'll be next, but, as far as management alternatives, refresh my short memory. They are in the snapper complex with lane snapper and another snapper, and so --

DR. SCHMIDTKE: Gray snapper.

MR. HULL: So it is in with gray snapper, and so, in that complex, there is an ACL in place, and so there is some management in place, as long as it doesn't go over that. David, you're up.

MR. MOSS: Thank you, Jimmy. Just speaking, and this is in response to I think what Andrew had said about the recreational fishery, but I can tell you that, within I would say probably the last five years or so, there's been a big boom in our recreational cubera fishery, believe it or not, and guys are using lobsters as bait, and I know that there is some misidentification of like smaller cubera and bigger mangrove, but there is absolutely a recreational fishery, and it tends to be at night, but especially down this way in south Florida, and it's definitely something that guys will go out and target, and there's a few spots, at certain times of the year, where they can really put a hurting on them.

MR. HULL: Thank you, David. I would say, just from what we've discussed here, and what I am seeing also, it sounds like the AP thinks that cubera probably needs to remain in a fishery management plan. If someone disagrees with that, let's raise your hand and talk some more, but, overall, it kind of looks to me like we're thinking that it does need to remain in a -- Cubera needs to be a species that needs to remain, and what do you all think? Jack, you're up.

MR. COX: Looking at the logbook here, on our VTR book here, on the cubera -- I am trying to see where we put our fish down, but what do we call that? I don't even see a gray snapper on it. How do we track it?

MR. HULL: Well, there is mangrove on there, but cubera is not, and so you would have to hand-write it in.

MR. COX: Well, if we do decide to keep it in the FMP, I would make a suggestion that we do add it to the logbook, so the guys -- Sometimes they don't add it. If they don't see it, they won't put it in there, and so we don't have a really good way to track it, but it sounds to me like, if we could keep the yellowedge and the cubera in an FMP, it would -- I don't know what it costs the agency to monitor the species, but I don't think we have to have an assessment every five years on each species, and I think that we certainly don't do it, but I don't know what it would hurt to keep it and let NMFS continue to track those highly-valuable species, like cubera and the yellowedge, and then take these other species that we're talking about, the silk and the margate and these low-interacting stuff and just keep them in some kind of aggregate and possibly let the state manage it, and I know that North Carolina could do it. Anyway, that's my suggestion.



MR. HULL: That's a good one, and I agree with it. Robert, you're next.

MR. LORENZ: I wanted to thank and agree with David Moss, because he confirmed things that, up here where I am, as a fisherman, have read about, and so I basically lean that the fish species should remain under a more watchful eye, and that could be a little more of a priority for MRIP, because how do I know that it wouldn't be available -- There is more and more being written and more and more fishers being shown of nice cubera snapper and places to fish for them in south Florida and the Bahamas, and so I see many pictures, and *Saltwater Sportsmen* has written about them, and so I think it needs to happen, some more of an eye on management, if anything.

MR. HULL: Thank you, Robert. I agree, and I think there's three species that, overall, stand out, and that's the cubera, yellowedge, and margate, so far, and it seems like those three stand out as probably needing FMP designation, or remain where they are and be put in some type of new aggregate or complex. James, you're next.

MR. PASKIEWICZ: Thanks, Jimmy. As far as the cubera goes for recreational management, they are lumped into the aggregate of all snappers on the ten per person per day, and that's correct, right?

MR. HULL: Mike, do you want to go back to that one? It's a snapper aggregate with three snappers in it.

MS. BROUWER: Yes, that is correct. It is in that ten-snapper aggregate.

MR. PASKIEWICZ: On the recreational sector as well?

MS. BROUWER: Yes.

MR. PASKIEWICZ: Okay, and that would be a ten per person per day?

MS. BROUWER: Correct.

MR. PASKIEWICZ: With this particular species normally being a larger, more trophy-style fish, would a management tool to kind of take that out of the aggregate on the recreational side, and say one or two, like I did hear, maybe from Randy, and I think that that might be something to look at.

MS. BROUWER: Are you suggesting just taking it out of the recreational aggregate and manage it under its own ACL?

MR. PASKIEWICZ: As far as that, not really the way that it's quantified as a three-species aggregate, but maybe as a daily bag limit situation on the recreational side. You know, I mean, if you have the pressure of a boat going on a cubera snapper trip, and they're trying to catch ten per person, that might have quite a bit more of an impact on the species than only having one or two per person per trip.

MS. BROUWER: I've got you. There is --

MR. PASKIEWICZ: Just like I have seen, in Florida, like the mangrove snappers, and you can only get five mangrove snappers within the ten-snapper-per-day aggregate, and so there is already a precedent in play here, saying, okay, well, as the ten snappers in the lane, cubera, and gray, you can only have two cubera.

MS. BROUWER: I see what you're saying, James. There is a restriction in place off of Florida for fish that are over thirty inches, and so you can only retain two fish, two cubera snappers, that are over thirty inches, but that's just off of Florida, and so I suppose one thing that could be done is expand that regulation to other South Atlantic states, but I see where you're coming from. Thank you.

MR. PASKIEWICZ: The fish under thirty inches, like David had mentioned, is that a really large mangrove snapper, or is that a small cubera, and that has been mixed up from time to time, I'm sure. Okay. I think that my point has been at least put out there. Thank you.

MR. HULL: Good points. Thank you. Andrew Fish, you're up.

MR. FISH: I was just going to say that there is more to that regulation, and that is only two over thirty inches per boat, and I was just dying to put that in there before everybody got a little more off-track, but that's all I'm saying. It's two per boat over thirty inches, and I think, the guys in the Keys that are catching these, they are catching the trophy fish, from the videos that I have seen, and I would say a thirty-inch fish is a thirty-pound snapper, which would be a trophy, in most cases, for a rod-and-reel guy, or even a diver guy, and that's all I wanted to say.

MR. HULL: Thank you, Andrew. Harry, you're up.

MR. MORALES: In preparation for this meeting, and using that tool, I have only caught cubera once every three years, and it's just not a fish that I am able to catch in anywhere from sixty to 150 feet of water, but I did go on YouTube, and I did see where, in south Florida, I mean, it is a targeted trophy fish, and, yes, they're using double-hook spiny lobsters, in I think it's like 300 feet of water, and they're bringing up monsters, and so I think that two fish over thirty inches is a good rule to have, because at least you're going to allow these fish to continue to grow, and that's all I have to say.

MR. HULL: That was perfect. Thank you, Eric. Myra, I think that we should -- Go ahead, Jack, but I think we need to develop some type of a -- Start a recommendation of something going here that we can -- As a working document here, as a recommendation to the council, or even a motion that someone could start, I suppose, as to what we're discussing here, so we have some meat in this, and it looks like cubera -- As I said, cubera, yellowedge, and margate seem to be three species that the AP feels that they need to remain in an FMP, and so I'll just leave it at that. Jack.

MR. COX: Jimmy, that's exactly what I was going to do. I was going to go ahead and try to wrap it up on the commercial side and just make a recommendation to -- I am prepared to make a motion that we keep the yellowedge, the cubera, and the margate in an FMP and take those other four or five species and let's move them into an aggregate, or let the state possibly look at managing them.

I can't speak to how the recreational guys are going to do their stuff, but, if we do go this route, I would like to see the cubera added to the logbook, just because we could be missing some data. If

they don't see it there on paper, they may not be putting that in there, and so we could have lost quite a few fish in our data collection, but I do want to say that, about ten years ago, one of our guys, a deepwater hook-and-line vertical line guy, caught a ninety-eight-pound cubera here off of Morehead. **That would be a motion, that we would keep those three species that I think are highly valuable in some kind of FMP on the commercial side.**

MR. HULL: Okay, and so there is a motion on the floor. It looks like we're getting ready to look at it and create it. Just hang on one second, and let's see what's going to happen here. Obviously, we will have more discussion before we finish with this. All right. I see the motion. **The AP recommends that margate, yellowedge grouper, and cubera snapper be retained in the Snapper Grouper Fishery Management Plan.** Do we have to get a second first, Myra, before discussion? I see some hands raised.

MS. BROUWER: Yes, and we need to get a second. I assume that Jack was the maker of the motion, and we would need to get a second.

MR. HULL: Yes, and, also, that would be -- He is talking on the commercial side, and I would assume that we need to include the recreational side, because there's an awful lot of potential landings there, and so we do need to hear a second from this, and does anyone -- To get a second from this, I guess I will have to go to -- You can unmute yourself and second it right away, or I have some hands raised. Let's see how we're going to handle this.

MR. LORENZ: Jimmy, I will second that motion on the recreational side. I will have one comment though attached to that, and I do not believe that it would be very important, from the recreational side, managing the margate, but I am definitely onboard with yellowedge grouper and cubera. If they're valuable to commercial, they are going to eventually be targeted by recreational fishing, because deepwater dropping is becoming ever more popular for people that can afford it, and so I would like to second that motion.

For simplicity, if it's going to be in an FMP -- If margate is going to be in an FMP because of commercial, I guess it isn't much more difficult to just leave it that way for recreational, and so, if that's true, I would like to second the motion as it is, to include recreational. If there would be some kind of efficiency by removing margate from management of recreational, then maybe somebody else can advise me on that. I see David Moss below me, and maybe he could speak to that.

MR. HULL: All right. Thanks a lot, Robert. David, you're up.

MR. MOSS: I mean, I was going to second, ,but, also, from the recreational side, and it's probably not the time yet, because we should talk about this motion first, but I was just going to make a motion that, for the recreational side, the cubera snapper be retained in the Snapper Grouper FMP as well, and the rest we can do as like an ecosystem thing, but certainly cubera is -- I don't want to see them lumped in with everything else.

MR. HULL: Thank you. Andrew Fish.

MR. FISH: I think, if you're going to put cubera snapper in there, you have to put yellowfin grouper in there, and I have captured more yellowfin in the last five years than cubera, by far, as a

diver, and I imagine, in the Keys area -- I would imagine they get them down there, I think, and I'm not sure, but that's just my opinion. Thank you.

MR. HULL: All right, and, before we go back, I would like to go to the tool with yellowfin and see where we're at, but let's keep talking first on this motion. Before we finish it, maybe we want to add to it. Vincent, you're up.

MR. BONURA: I would like to add that I think the yelloweye needs to be -- We need to keep that in an FMP as well, because, in the Keys, we do catch them, and there is a targeted fishery for the yelloweye.

MR. HULL: All right, Vincent. I heard you pretty good. Next time, maybe get a little closer, so we can all hear you loud and clear, but I heard that. Jack, the motion is on the floor, and it's been seconded, and there's some people that think that we need to possibly add a couple other species to this, and that's why we're here discussing this, everybody's area, and so can we hold off on the vote for this, Myra, and have some more discussion on those other two species, or do we need to vote on this now?

There is no vote, and that's right, and we're doing this by consensus, and so I'm hearing people that want an addition to this, and so maybe we need to -- I didn't look at yellowfin, and Andrew was saying that he catches a lot of yellowfin snapper, and so that's something maybe we need to look at the tool, and I will go back to the motion maker, Jack. Go ahead, Jack.

MR. FISH: That's yellowfin grouper, the fireback.

MR. HULL: Okay. Roger that. Jack.

MR. COX: **Yes, we do catch quite a few firebacks here, and thank you for clarifying that, but, if you wanted to add the firebacks to it, I would be fine with the motion.** I mean, we catch probably as many firebacks as we do cubera, and so we could add that, as far as the motion. You know, you start to really see a big difference in the way we manage our fisheries when you're up here on the North Carolina end and we've got the Keys guy on, and that's where it would be nice if we could get the states to start helping us manage some of this stuff, so, the more important stuff, we can move on and do a better job of the stuff that we do share in common, like the redeyes and the other species, but I'm fine with that, being that that's the yellowfin. Other than putting yellowfin grouper on there, I don't know if I wouldn't, in parentheses, Myra, put "fireback" in there as well, so people -- Our fishermen really wouldn't know what that meant. Thank you.

MR. HULL: Thanks a lot, and I think that Vincent was talking about silk snapper as being targeted down in the Keys. Vincent, do you want to come back up? Was that what you were talking about, was silk snapper?

MR. BONURA: Yes, that's correct. We catch those down in the Keys pretty good, and then there are the blackfin that are mixed in here or there.

MR. HULL: Okay. The motion right now reads: **The AP recommends that margate, yellowedge grouper, yellowfin grouper (firebacks), and cubera snapper be retained.** Now we're talking about adding silks, and so that goes back to the motion maker and the seconder, to see if they want

to add that in and see if everybody agrees with that, and then we'll have that motion complete. Then we can talk about the ones we didn't include in there and possibly make a motion -- Somebody can make a motion to move them into the ecosystem. Jack, it's back to you, as the motion maker, as far as adding silk. Go ahead.

MR. COX: I mean, I'm fine with that. If that's what the guys are seeing down there, and they feel like it needs to be managed, and I certainly can't speak for us, but we might catch one a trip, if we're lucky, but certainly I'm fine with that, including it in the motion. **Vincent knows what he's talking about, and that's what they're seeing, and so, if it's important to them, let's put it in there.**

MR. HULL: Right on, and the second was from Robert. You seconded it, and do you agree? Will you second it now with these additions?

MR. LORENZ: Jimmy, I will withhold my second at the moment, and somebody else could jump in, if they wish. My concern now is, if we were looking for simplicity, does this motion -- I would just like to make a comment. Does this motion, as written -- We didn't save very much, and is there anybody with that concern out there, that -- It's five species, and so we didn't -- Compared to what we were asked to think about, we didn't knock very many out from needing an FMP.

MR. HULL: All right, and so you're withholding your second. You know, this is a recommendation to the council, and they are going to, obviously, do all the work that we're not putting a lot more time into, and they're going to do the work and the tool and the analysis on these and make their decisions. I think the point that we're making is that some of these species really need to be looked at before we move them over to ecosystem, because we're seeing that they are targeted. We're seeing things that may not show up in the data, and that's why we're here, and so it is just a recommendation.

MR. LORENZ: Okay. Thank you for the clarification. I kind of get a little spinning in my mind here. I will second it, on the basis of what you said, and I do agree that it is a recommendation coming from us, and this is essentially to represent both sectors, as far as a combined interest of everything that anybody thinks needs to be done, and so I will second this.

MR. HULL: Thank you, and so it's been seconded, and see hands raised, and so we've got to go to these hands. Go ahead, Red. You're up.

MR. MUNDEN: I was going to second the motion for the five species.

MR. HULL: Thank you, Red, and so we have another second. James, you're up.

MR. PASKIEWICZ: Thanks, Jimmy. I really did appreciate your clarification there, and my hand did go up to second that motion. You're absolutely right that this is our charge as a panel here, and, up and down our region, we are targeting these species, recreationally and commercially. The fisheries management plan has got to be in place, and I think that we are doing the right thing for what we're supposed to be doing, making recommendations, and so I really do support this. Thank you.

MR. HULL: Thank you for that. I appreciate it. I mean, there is, obviously, some species here, a couple more, that we don't feel -- Jack, you're up.

MR. COX: I just wanted to Vincent to clarify something. I may have been confused here when I was doing the motion. Is he talking about the yelloweye snapper? I think so. I think that's what he might have been talking about.

MR. HULL: Yes, he is. I believe so, too. Vincent, did you want to clarify, yelloweye or silk?

MR. BONURA: That is correct, yes. Yelloweye snapper.

MR. COX: Okay. Jimmy, then that will change the motion a little bit, I think, and so we're not talking about the silk snapper. We're talking about the yelloweye snapper. Am I correct?

MR. BONURA: I think, on the logbooks for the FWC here in Florida, they're the same animal, I believe.

MR. HULL: On the logbook, it is silk/yelloweye, and so they're considered the same on the logbook. It's silk/yelloweye.

MR. COX: Here, we have a different snapper that we call a silk, and it's actually a grouper. We call it a silk here, and it gets confused, but it's that creole grouper, and it looks like a snapper, and do you know the one that I'm talking about that's got the real fine scales on it, and so it's like a b-liner, but he's more of like a one to two-pound fish, but, anyway, let's just make sure we put yelloweye in there as well, in parentheses, because we do have a silk snapper here, and it's actually the creole grouper. Thank you. Thank you, Vincent.

DR. SCHMIDTKE: If it would help, I can grab control and pull up the picture here, just to make sure that everybody is on the same page.

MR. HULL: That would be great.

DR. SCHMIDTKE: This is what we have for silk snapper, and I'm just making sure that's the one that folks are discussing.

MR. HULL: Yes, that's helpful. That's, obviously, what we call a yelloweye here off of Florida. Good deal. I appreciate that. That's going to change the motion. Before we do that, let me go to Randy. Go ahead, Randy.

MR. MCKINLEY: Is currently the silk snapper, or yelloweye, is that -- Does it have a size limit now?

MS. BROUWER: That was removed recently, actually. It used to have a twelve-inch size limit, and I believe we took that away, fairly recently. This year.

MR. MCKINLEY: That's what I thought, and, you know, the ones that I'm seeing up here are small. I mean, they might be six or seven or eight-inch fish, and the guys just -- We just mix them in with the b-liners, and so what I would hate to see is that fish being managed to where we have

a size limit and every one of this is just thrown overboard, and I hate discards. I don't really want to put that fish in there. We're not seeing that many of them at all.

MR. HULL: All right. Thanks, Randy, and so you would not vote for that motion, and so our consensus -- We're going to have to go to a vote, once we get this. Jack, it's back to you.

MR. COX: Okay. I like the way the motion stands, if we can bring that back up, and let's read the motion again, to make sure that everybody understands it, and yelloweye is very important here. The yelloweye snappers, we're seeing more and more of them than we ever have, and we've got boats now that are coming in with 600 or 700 or 800 pounds a trip. Years ago, I was really concerned about that stock. For a long time, we were only seeing maybe fifty to a hundred pounds a trip, and so we are on the upswing on the yelloweye, and they're averaging two to five pounds apiece, and so I appreciate that, Vincent, that I missed that one, but that's important.

MR. HULL: All right. Thank you, Jack. **I don't see any more hands right now, and so I'm going to go ahead and read the motion, and we did change it, and we added the parentheses, and I don't know if we have to get another second, and Myra can chime in on that, but the AP recommends that margate, yellowedge grouper, yellowfin grouper (firebacks), silk snapper (yellowedge), and cubera snapper be retained in the Snapper Grouper Fishery Management Plan.**

That's the way the motion reads now, and I was seconded a couple of times, and all we did was put "yelloweye" in parentheses since then, and so I believe that, unless the people that seconded it have a problem with it, it's good to go. We do have opposition from Randy, who spoke against having yelloweye included in there, and so we'll have to have a vote, I do believe, Myra, and is that correct?

MS. BROUWER: I believe you can ask for a show of hands of those who oppose it, and we will note that. If it's only a couple of people, then the motion will pass, and we'll note how many oppositions there were.

MR. HULL: There you go. **You all heard it, and so, if you oppose this motion, raise your hands.**

MS. BROUWER: It looks like there is no hands raised.

MR. HULL: **All right, and so the motion passes.** Thank you, AP. That's good, and I think that's a good start to send this recommendation to the council, so that -- You know that they're going to be digging in and making really good choices on this, but these are some species that we feel, from North Carolina to the Keys, for all of our different viewpoints, that need some fisheries management plan, and so, Mike, it's back to you, I guess.

We could talk -- I don't know if you have more to give us or if we should maybe -- If we only think that these are, then, obviously, we're thinking that what's left for discussion doesn't need it, and so maybe we can just leave it like that, and then the council can go from there, and we don't really need to get into the discussion on those that are in the ecosystem unit, but go ahead, Jack.

MR. COX: One of the council members brought something to my attention here just a minute ago, and Vincent and I talked about this at one meeting early on, but what about a recommendation for barrelfish? Is that something that we should include? It's something that we're not getting advised on, but we talked about -- Not to try to complicate things, but barrelfish are something that we're interacting with more and more, and I think Vincent knows a lot more about that than I do, but we do catch it here, and it's probably about as common as we do cubera, but it's something to bring up for discussion, especially in the Florida area.

MR. HULL: Dave Snyder, you're up. I don't hear Dave right now. We'll go to Vincent and then come back. Dave, as soon as you can unmute yourself, come on. Go ahead, Vincent.

MR. BONURA: I'm here. I was just hearing Jack, and I think, on the barrelfish, that that would be a great idea to --

MR. HULL: We can't hear you, Vincent. I cannot hear you. Get close to your mic.

MR. BONURA: I said that I was hearing Jack over there on the barrelfish, and I think it would be a good idea to add the barrelfish into the FMP as well, because, here off of Broward County, there are quite a few boats that are targeting barrelfish as a directed fishery.

MR. HULL: Okay. Let's see if Dave is there. Are you there, Dave? Apparently Dave is having some difficulty unmuting, and so maybe he could send a text or something in the questions area.

MS. BROUWER: Jimmy, Dave is having some problems, and so he just sent an email to me, and so I will just read it. It says barrelfish is more and more popular, and the demand has been, and it will continue to grow, and I agree with Jack that it needs management attention.

MR. HULL: All right. Thank you. Well, that's good, and so we've started some script here to consider evaluating whether barrelfish need to be included in a management plan, and so the current status of barrelfish, as far as in any type of management or anything, I have no clue, and I have no idea what the situation is on barrelfish, if it's in any type of anything, and so we'll go to -- - Maybe we can answer to that, and we'll go to Robert. Go ahead.

MR. LORENZ: I'm a little bit with you, Jimmy, and so I'm just going to ask the commercial reps, and Jack Cox can probably answer this, and Vincent, and so I'm going a little more from book knowledge, but just a question. The barrelfish, it seems to me that they're in the same environment as the -- It could be in the same environment as the yellowedge grouper, and maybe some tilefish, and am I correct on that, or are the barrelfish in a totally different environment?

MR. HULL: That's a good question, and I thought that they were with wreckfish, that guys were catching them also, and so I don't know, and maybe we can get staff to give us something on that. Where are the barrelfish being caught, and how are they being recorded, and how are they being managed and monitored? I don't know. I know that we don't sell them, and I don't have any boats that are bringing them in to me, and I know there is a dock here in Ponce where they have wreckfish boats come in, and I believe they do have barrelfish when they are wreckfish fishing. David, you're up.



MR. MOSS: Thank you, Jimmy. Barrelfish, it's another one of those deepwater species that more and more people are targeting, and not barrelfish necessarily specifically, but just these deepwater fish that we're going to be hearing more and more about as we move down the road, and that is something that we need to really start looking at, and maybe not be as reactive, but a little bit proactive on a lot of this stuff, because all these deepwater fish -- Especially down here, and the shelf is so close, and they're so accessible. With all the modern techniques and gear and everything, and you can drop right on top of them, and electric reels and all that stuff, and all these deepwater fish now are really getting hammered, and it's becoming a really big recreational issue.

MR. HULL: Thank you, David. Jack.

MR. COX: I was going to just say that the range of these fish are from Florida all the way up to Virginia. We buy them from dealers in Virginia, and they don't track them either. I don't know if the State of North Carolina tracks barrelfish, but, just like David said, these fish come in, and we're seeing more and more of them, especially when they're deep-dropping for swordfish, as a bycatch, and we're seeing them -- Our guys that are snowy grouper fishing, in 600 or 800 feet of water, are coming in with one or two a trip, and sometimes they will come in with fifty or a hundred pounds.

I know, at one time, I was talking to Vincent about it, and he and I were concerned about it, because they were really banging away at them down there off of Florida, and some of the guys were catching 200 or 300 or 400 pounds, or 500 pounds, a trip, and it's not being recorded, and the ex-vessel price on that fish commercially is between five and six-bucks a pound, and so I will be a targeted species. The flavor of that fish is a lot like a grouper. Thank you.

MR. HULL: Right on. We do have some script here to consider evaluating whether barrelfish need to be included in a management plan, and so I think we're capturing that to the council. Bobby Freeman, there you are. Bobby, you're up.

MR. FREEMAN: In all my years of experience, I have caught one barrelfish in 630 feet of water, and the mate wound up taking the fish home, and he said it was not very tasty, and so that's 100 percent of my experience with them, and so I don't know what we would manage, and maybe they are farther offshore than we typically fished.

MR. HULL: Thank you, Bobby. Vincent, you're up.

MR. BONURA: I was going to add that, here off Broward County and Miami, they get them in 800 to 1,200 feet of water on the rocky hard bottom, and the wreckfish are a bycatch of the barrelfish fishery. The ex-vessel price down here is about \$4.50 a pound.

MR. HULL: Okay, and so I think we have captured what everybody is talking about here, to consider evaluating whether barrelfish need to be included in a management plan, and that's what we're telling the council that we feel, and so I don't see any opposition to that, and so let's keep going. If there is nothing else to talk about right here on these subjects, I'm going to hand it back to you, Myra, and see where we're at.

MS. BROUWER: Thank you, Jimmy, and thank you all for that really good discussion. We will definitely take this back to the council in December, and I did capture some of your comments that

will be included in the report, and so, at this point, if we are done with the discussion on this agenda topic, we could jump to red porgy, which I suspect is going to take a little while, if that's okay, Mr. Chair.

MR. HULL: Perfect.

MS. BROUWER: Okay, and so just give me a second here to pull that up.

MR. HULL: Yes, ma'am, and I really want to thank the AP for that discussion on that. I think we really dug into that good and got some real good information from up and down the management range from all the states, and so I really appreciate your efforts on that.

MS. BROUWER: Okay, and so here is red porgy. There is two attachments for this, the presentation, and then there's a paper that we put together so that you would have a little bit extra information, and I'm going to take over the screen for a little bit, just to give myself a chance to look at my notes as I'm giving you this presentation, and I don't want to leave anything out, and so, as soon as I'm done, we'll minimize the screen back, so that we can see the raised hands, and then I will be happy to answer any questions.

I should also mention that some of the analyses that I'm going to present were conducted by Jeff Pulver at the National Marine Fisheries Regional Office, and Jeff is in the audience today, and so he'll be around to answer any specific questions you may have on the analyses that have been put together so far for this amendment.

First off, a little bit of background on how we got to where we are. Back in 1991, Amendment 4 to the Snapper Grouper FMP found that the stock was overfished, or declared it overfished, I should say, and undergoing overfishing, and so that's when the first ten-year rebuilding plan was put in place and a minimum size limit.

Then, in 1999, there was an emergency rule that was issued that prohibited the harvest and possession of red porgy in federal waters, and that was to give time to the council to develop an amendment that would put in permanent regulations, and that was implemented in 2000, Amendment 12, and that amendment closed the commercial harvest during the peak spawning season and reduced the trip and the bag limits and specified an eighteen-year rebuilding plan.

In 2006, we had an update to the stock assessment, and the results there found the stock was undergoing overfishing, and there was another update done in 2012, and both of those -- My recollection is that there was a lot of concern about poor recruitment in that fishery, and then the most recent stock assessment that was just completed, SEDAR 60 in 2020, found that the stock is overfished and undergoing overfishing.

The concern is, obviously, that the stock is not making adequate progress towards rebuilding, and so I'm going to give you just a little bit of background on the results of the stock assessment, with the understanding that this is not a presentation on the stock assessment, and so this is a figure showing the spawning stock biomass relative to the level that indicates where the stock is considered to be overfished, and that level is called the minimum stock size threshold.

You can see here this curve below the threshold, and that's been going on for quite some time, and so this is where we are now, indicated there by that red circle, and, if you look at the spawning stock biomass relative to the level that is needed to produce maximum sustainable yield in a fishery, again, you see that we have been well below that level for quite some time.

Then, if you look in terms of fishing mortality, this is the ratio of the current fishing mortality to that which would produce maximum sustainable yield, and you can see that the fishing mortality has been well above that threshold for the majority of the time series. There's a little bit of a dip here in 2000, when Amendment 12 went into place, and there's been -- It has just dipped down a little bit here and there, but clearly things are not looking good right now. These are graphs, as I said, that came from SEDAR 60, the latest stock assessment, and that assessment was done with data through 2017.

These are the recommendations from the council's Scientific and Statistical Committee, and these are the catch level recommendations that were presented to the council in June of this year, and so, at the top, you have your overfishing limit, and so this is the amount of pounds that is -- If you go above it, then you would be overfishing. We also have these levels presented in numbers of fish, and this, of course, is starting in 2022, and all of this assumes that management would be in place in 2022.

Below that is the acceptable biological catch level, and so this is the level that needs to be maintained, and so, typically, the council has been setting the annual catch limits at the same level as the ABC, and so you can see that, for 2022, the ABC would be 75,000 pounds, and then it goes up from there a little bit, because that assumes that the stock rebuilds a little bit each year, and so you can allow a little bit more catch.

Currently, the ABC for this stock is 328,000 pounds. However, this was based on pre-Fishing Effort Survey revisions to the recreational estimate, and so you can't directly compare those two numbers. The council cannot exceed the ABC that's recommended by their SSC. As I said, they can set the ACL at the same level, but they can't go above it.

What does this mean? It means that there are some pretty significant reductions that are going to be needed for red porgy, based on the SSC's ABC recommendations, and these are just the numbers that I was just telling you. Again, it's reiterating that those two catch levels are not directly comparable, because of the pre and post revisions to those recreational landings.

Now that I have hit you with that, the timing of this amendment. In June, as I said, the council received the ABC recommendation from the SSC, and they also received a letter from the National Marine Fisheries Service, indicating that the red porgy stock is overfished and undergoing overfishing, and so, when that happens, under Magnuson, the council needs to get busy developing an amendment with actions that end overfishing immediately and rebuild the stock, and the council has two years to develop an amendment, and so our statutory deadline is June of 2022.

In September, the council reviewed an options paper, very similar to what I am presenting here to you, minus some preliminary analyses that we're going to go over, and the council requested that the AP be given the opportunity to discuss possible changes to management measures for red porgy and bring that back to them in December, when they're going to review these preliminary analyses and whatever input you all have for them.

In December, they would be approving this amendment for scoping, and that basically starts the development process, and we take the actions out for public comment and bring those back to the council in the spring and go from there, and timing it all out, so that hopefully regulations would be implemented by the middle of 2022, so we can meet that statutory deadline, and so I'm going to walk you through the actions, potential actions, and the council hasn't had a chance to really dig into this and select a range, but this is what we have for them.

Option 1 is always no change, and so, in terms of rebuilding, the rebuilding plan ended in 2016, and so all of these scenarios are going to assume that management starts in 2022. Option 2, where you see  $T_{min}$ , T for time and min for minimum, and so that's the minimum amount of time to rebuild the stock, and that is assuming that F, or fishing mortality, equals zero. Under the current projections, that would give you a 41 percent probability of success to rebuild the stock in that amount of time.

Option 3 is  $T_{min}$  times two, and so you just multiply that, twenty years, and we don't know what the probability of success would be, because we don't have those projections, and we would have to get those from the Science Center, and those have not been requested, pending direction from the council, but these could be things that they could consider, if they wanted to. Another option would be to do  $T_{min}$  plus one generation, and one generation is the average length of time between when an individual is born and the birth of its offspring, and, for red porgy, that time is around six-point-something, 6.4, years, something like that. That would be another option to consider for rebuilding.

Then, finally, the  $T_{max}$ , and so the maximum time allowed for rebuilding, is to go ahead and set it at a fishing mortality at 75 percent of the fishing mortality at MSY, and that, according to the projections, would take twenty-six years, and so, with rebuilding happening in 2047, and the probability of success there would be 51 percent. I should say that this last projection assumed current fishing mortality from 2018 through 2021, and so that's what they are looking at there.

Then we move on to looking at the catch levels, and so this is the total ACL, and this would adjust those fishing levels. Under no change, it would remain at 328,000 pounds for OY, optimum yield, and the total annual catch limit. The council could update the ACL to make it equal to that updated ABC that I showed you earlier, which, for 2022, would be 75,000 pounds. They could step it down a little bit from that ABC and set the ACL at 90 percent of that updated ABC, and that would put them at 67,500 pounds, or they could step it down even further, to 80 percent of the updated ABC, bringing that catch level down to 60,000 pounds, and these buffers are considered in management to account for management uncertainty, and so the council certainly always has the option of doing that when setting those catch limits.

Action 3 would look at sector allocations and so how they would apportion that total ACL between the commercial and the recreational sectors. Under the current conditions, we have a 50/50 split, and so each sector would receive 37,500 pounds, and the council could potentially use their allocation formula, and this is something that was put in place in 2011 and 2012, when they developed the Comprehensive Annual Catch Limit Amendment, in response to the reauthorization of Magnuson, and, at that time, they used a formula where the sector ACL is calculated using half of the mean landings from 1986 through 2008, plus half of the mean landings from 2006 through 2008, and so, if you apply that formula to the landings stream for red porgy, these are the

percentages that you get, which are not that different from the existing ones. It would change the apportionment, commercial/recreational, just a little bit.

Then, finally, the other option they could potentially consider is to just remove sector allocations and manage it under a sector ACL, which would then allow both sectors to fish on that 75,000 pounds. If they do that, then they're going to have to talk about changing the accountability measures, and we haven't had those conversations yet.

Then we move on to Action 4, which would adjust the recreational annual catch target, and so an annual catch target is a level that can be used to prevent your catch from exceeding a sector's annual catch limit. Now, our council has not employed ACTs in management, but they have specified them for the recreational sector, but they're just not tied to any kind of changes in management so far.

There is, currently, an ACT for red porgy, which you see here is 117,555 pounds, which is, obviously, much higher than the recommended ABC, and so they're going to have to revise it with new catch levels, which would put it at 20,753 pounds whole weight for 2022, or they could remove it, and the ACT is also calculated through a formula that was put in place at the same time as the allocations formula, and it uses the proportional standard error in the recreational landings, which is a measure of precision, and so, the more common a species is in the catch, the more intercepts there are to inform the estimates, and so the lower that PSE.

Now I'm going to get into showing you some of the landings and some of the preliminary analyses, so that you guys can have an informed discussion about this, and so this table is a little strange, and it's kind of a two-part table, and so, on the left-hand-side of the table, you have the previous landings, for the last five years, and so we've got from 2015 through 2019, and 2019 being still preliminary at this point, and these are in pounds whole weight, so you can see what the landings have been for the past five years for red porgy.

On the right-hand-side of the table, you have the proposed catch levels, so that you can have those in front of you to compare, and then we have it split for the two different allocation scenarios, if you keep it at 50/50 or if you go with those percentages from the allocation formula, which just bump it up a little bit.

For 2019, your landings were over 100,000 pounds, and compare that to where we're going to need to be in 2022, and that's kind of what we're getting you to think about here, and so, if you look, percentage-wise, the reduction from that average catch, from 2017 through 2019, we're looking at a 68.5 percent.

In terms of commercial regulations, I just put this up here to make sure that everybody is up-to-speed on what's been put in place for red porgy, because there has been some changes recently, and we are at a fourteen-inch minimum size limit, total length, and there's a sixty-fish trip limit from January through April, and 120 fish May through December, and this was a fairly recent change.

This was implemented in February of this year, and this was done in response to the AP and other folks bringing to the council's attention that there were a lot of dead discards in this fishery, and that sixty-fish trip limit was sort of a -- It was kind of a bycatch allowance, if you will, at the

beginning of the year, to minimize those dead discards in the fishery. The commercial ACL was also split, and it was allocated 30 percent to January through April and 70 percent May through December.

Here's where we get into the analyses that Jeff prepared, and this is showing the percent of trips that are harvesting red porgy, and so this is based on a number of trips, 13,096 trips, that harvested red porgy from 2010 through 2019, and this is in numbers of fish, and it is presented percent by bin, or category, if you will, and so the take-away is, if you look at the percent of trips harvesting red porgy between these two years, greater than 50 percent of those trips are estimated to have harvested less than thirty fish during any given trip. This is a good visual for that distribution of the catch in the commercial fishery.

This graph shows you the predicted landings with 95 percent confidence intervals based on data from 2017 through 2019 with the current trip limits. January through April are in a different color because they had to be back-filled from the average of 2017 through 2019 May landings, using the mean ratio of May landings to January through April landings from the whole time series, 1986 through 1999, which is the final year the fishery was open during that portion of the year, until this year, and so we had to go back and back-fill those data. You can see that catches are highest in the month of July, but you can get an idea of the seasonal distribution of the commercial catch.

This shows you the potential reduction in future landings under various possible trip limits, and so, here, we kind of just book-ended, and the council hasn't directed us to do kind of particular analyses of any trip limit, but we wanted them to have some information to have those discussions, and so, if you go from sixty fish down to forty-five, you're looking at a potential reduction in landings of 16 percent, and so that's what this table is showing you, and so we wanted to just have a good range of potential changes in trip limits, and I put these in a different color, just to indicate that this sixty-fish trip limit is very recent, and it was implemented early this year.

Moving on to recreational, again, the two-part table here is showing you, on the left, the previous landings over the last five years for the recreational sector, and this is in pounds whole weight, and then the proposed catch limits under the two different scenarios for allocations, and these are estimates based on MRIP using the new methodology with the Fishing Effort Survey, and so, again, just looking at the average catch and comparing that to where we need to be, it's a pretty substantial reduction. Again, things are not directly comparable, because of that change in methodology for the recreational landings, but it gives you an idea of the kinds of changes that need to happen.

Here are the recreational landings by two-month wave, and the predicted future landings are in this yellow line over here, and this is using data from 2017 through 2019, and here we used the geometric mean instead of the arithmetic mean, because there's a lot of variability in the data, but you can see the majority of the landings there in the summer, and there's a peak, and it's probably one of those expansion things, in 2018.

Recreational regulations, again, just to make sure everybody is aware of where we are, three fish per person per day, or three per trip, whichever is more restrictive, and that minimum fourteen-inch total length size limit.

This figure shows you the number of red porgy caught per angler on a given trip, and this is information collected by MRIP and the Headboat Survey, using those same three years of data, 2017 through 2019, and so you can see that the majority of anglers are harvesting less than the current bag limit, by a good amount. Also notice though the number here of private recreational information here, this number, and I believe it's intercepts, and I'm not sure, but it's pretty low.

This is a similar table to what I showed you for commercial, the estimated reductions from projected landings for various bag limits, and so, again, we have going down to two, going down to one, and what that would do, percentage-wise, to the landings by each of the modes, and so the impact varied, of course, and the largest reductions are in the private mode, and we're looking at a 30 percent reduction.

Here's where I put up some discussion questions that will hopefully get you guys started talking about this. Given that there needs to be approximately a 70 percent reduction in landings for each of the sectors, what does the AP find most important for the commercial sector? Is it going to be season length or trip limit, or a combination of both, and which months do you all think should be avoided, if a seasonal closure were to be implemented, or you can think of it the other way around.

When would be the best months to open harvest for red porgy? Are there any other management measures that you can think of that the council should consider for the commercial sector, and, based on these proposed reductions, the recreational season could in fact being a single two-month wave, and so, if that ends up being the case, when would be the best time to implement a season for red porgy? Is it more important to keep a certain bag or vessel limit or to have a longer season, and so what are the tradeoffs there? Are there any additional changes in management, again, that should be considered for the recreational sector?

That wraps it up for me, and I put this here, in case you all wanted us to pull up the information that the AP used to put together the fishery performance report, and we had summarized all those data, and that nifty little tool that we use in the FPR for red porgy that you guys put together a couple of years ago was also included in your briefing book, and so I'm going to minimize this and then open it up for questions.

MR. HULL: Thank you, Myra. When you're ready, James, you're up.

MR. PASKIEWICZ: Myra, if you don't mind bringing up the four suggested actions.

MS. BROUWER: I'm not sure which suggested actions you're referring to, James. I'm sorry.

MR. PASKIEWICZ: One being no change at 328,000 pounds, and then there were several scenarios with like -- Yes, that one. I want to preface this that I don't harvest this species, and I have no interaction with this species, and I kind of wanted to get out in front first on this, just because I'm a commercial fisherman, and I don't really like when things are just flipped upside down, and so, if we ended up going to a situation -- Actually, can you show me the next one up that had the projected success rates?

This one here, Option 5, and something like this -- I mean, I went on the website and pulled the landings for 2019, and it looked like the commercial sector had 82,000 pounds of landings in 2019. If we were to do a 75 percent overall reduction in the ACL, that would bring it from 328,000 to

246,000, 123,000 for each sector, split in half, which is still above what was being harvested in 2019, for argument's sake, and I did just go on the -- I saw some different numbers in your charts, and I don't know why the numbers aren't the same, and it doesn't really matter, but, if the commercial sector was still allowed to harvest 123,000, that would be more than what they're harvesting already, and that would feel, to me as a fisherman, that, hey, there are conservation efforts making headway in helping preserve the species, and I'm still going to be able to catch what I've been catching.

I would say the 75 percent of the fishing mortality rate over twenty-six years, with a 51 percent success rate, might be attractive to me as a commercial fisherman. If, in any one season, we don't hit the ACL, I think that that should immediately trigger a reduction in the 75 percent, maybe even to 50 percent, and then we would be harvesting at a much lower rate within all the current guidelines of keeping the species, and we're not cutting anybody off, just from the hip, right from first impression, for me. Thank you.

MR. HULL: James, before Myra jumps in, you're still using the numbers from the old assessment. What we're going to be dealing with is 50 percent of 75,000 pounds, is what we're dealing with, and so you're looking at using that  $T_{max} F$  equals 75 FMSY and apply it to like thirty-two-and-a-half thousand pounds, and so that's what you would end up with under that scenario, which is going to be a small number. I agree with you that we need to keep the fishery open, but how do we do that when it's going to take a great reduction, but the number -- The ACL is going to be, total between both sectors, 75,000 pounds, and then split that in half for commercial and half for recreational. Harry, you're up.

MR. MORALES: First, let me say how naïve I was to the red porgy and how overwhelming the information was that I -- Hell, I had to go through it a couple of times. I come to you from the business world, and so I'm a recreational fisherman, and I love it, but I'm only there fifteen years as a recreational fisherman in saltwater.

A management plan, next year, that will have been thirty years in the making, and showing a 95 percent failure rate, in my opinion, is a failed management plan, one that cannot sustain itself, because you're approaching zero, and so you're approaching a point where the red porgy wouldn't matter, because they won't be there.

As a business man, I look at things in terms of either I'm helping increase my business revenue or I'm looking to cut my cost, right, and, either way, I am generating a profit, one way or the other, and I looked at where the fishing was in 1991, and how we continue to focus on reducing the catch limit, and, I mean, you almost want to say that that dog can't hunt, because I don't care how far you cut it back.

For whatever reason, the stock continues to be overfished and overfishing. Given the fact that, in the next twenty years, we're going to have virtual anchoring for damn near any kind of boat that's out there, that they can sit on a spot, and we're going to have side sonar far more plentiful than it is today, and so that recreational fisherman, or any other fisherman, is going to almost be able to play a video game to get this fish, and I'm questioning -- Beyond catch limits, where is the management plan to expand the habitat? I went researching that, and I was shocked to see that Florida had 3,700 artificial reefs, and, here in South Carolina, we're proud to get four of them designated as special management zones, and, given the fact that you're looking at this chart that



says, in twenty-six years, you might have a 50/50 shot at improving the stock, and so that would be fifty-six years of effort, and so where is the expansion of the ecosystem?

Since we're dealing with this thing in terms of decades, where is the expansion plan to create habitat in deep water, as they did in Florida, where they dropped the aircraft carrier in 300 to 400 feet of water, and, oh, by the way, what an incredible economic impact it had as well on the fishery, and so I come to you from that perspective, that, for me, it's just mind-boggling. Thank you.

MR. HULL: Thank you, Harry. I appreciate the comments. Randy McKinley, you're up.

MR. MCKINLEY: Thank you, Jimmy. Harry sort of was on the same line I was. I mean, these rebuilding plans for the porgies have not worked, and, at some point in time, even going through these rebuilding plans, it may be that you just have to realize that it doesn't have anything to do with overfishing. I mean, I think, in the last year, it definitely has something to do with the increase in red snapper, and I know, just this -- I wasn't on the panel when they did the fishery performance report, and I came on six months later, but I know, back in the 1980s, that was pretty much a bread-and-butter go-to fish. If the grouper didn't bite, or you couldn't get offshore for the vermilion and stuff, you could always be dependent on two or three boxes of pinkies.

With all that being said, we fought so hard to be able to catch these things in January, February, and March, and not just for the discards, but to keep them on the market. I mean, it's a little bit cheaper fish, and dealers want to have them, and restaurants want to have them, and so, if we had do anything, I would recommend that we go to a two-thirds reduction on the numbers, maybe doing forty fish May through December and twenty in January through April, even though -- I base that on reducing it two-thirds, and the estimated reduction that Myra had presented was a bit less than that, but most definitely keeping it open as long as possible.

MR. HULL: Thanks, Randy, and I agree with your thoughts, and, also, it may be that this stock may never -- It doesn't look like it's ever going to rebuild, and it's kind of been, the last thirty or forty years, at equilibrium of where it's at. Myra.

MS. BROUWER: Thank you, Jimmy. There's another graph that I wanted to show you guys, and I will bring it up on the screen now, and so this is the graph showing recruitment of red porgy over time. You just said, Jimmy, the situation is not a good one, but it may not be entirely attributed to management or fishing activities, and you can see that recruitment has been going down for a long, long time, since the 1980s, and so this is one of those stocks where it's a very difficult thing for managers to figure out can they change, in order to rebuild to help the stock, and so I just wanted to make sure that you guys saw this, and this is something that the SSC struggled with, and something they reiterated, that recruitment seems to be crashing, and we don't know why.

MR. HULL: Thank you, Myra. Bobby Freeman, you're up. Bobby, are you there? We'll come back to Bobby. Robert Lorenz, you're up.

MR. LORENZ: I know Harry started saying it, and also Randy, and I would just throw a couple other things into the mix for consideration only and get some further comment. Due to the fact that I don't -- If we're going to go under Magnuson, we're looking at, and I will speak from the recreational side, some draconian management steps here, and so things I would like to just bring up for consideration, and this probably holds true -- I just don't know for Florida, when you get

south of like Cape Canaveral, but this probably holds to Georgia and South Carolina, and I'm here in the Onslow Bay area of North Carolina, and, generally, it's known among the fishermen, and certainly among the recreational fishermen, and we're often told by the charter folks, that, where there are red porgies, there are going to be red grouper, and also some scamp.

This has led -- What I have seen over the years, and I can't speak for this year, of -- One thing that I'm going to bring up in Topic 5 has been some very bad behavior on the recreational fishing side, and that can be that -- I have seen undersized red porgies, et cetera, chopped up for bait, and many folks have said that, and I have heard that a lot, and so that may be going on more than people can even imagine, and it's probably increasing dead discards, and so that's going to go under the best fishing practices, some way to get some kind of outreach out there, and this type of behavior on a critical species that's under some critical regimen for management -- You just can't be using them for something like bait. That would be one thing.

With that said, if what everybody knows here is truly true scientifically, that porgies and red groupers kind of hang out on the very same type of structure, that kind of natural reef that's out there, that lower level, would we want to consider closing -- One option could be, to get some reduction, would be to close the red porgy season during the grouper spawning closure, and that doesn't sound like something that Randy would like, but I will throw that on the table, because of that one chart that Myra showed of red porgy harvest into or through May, and that kind of knocks out some of August onto the rest of the year, what we think people are catching, and so most of the catch would be in the way.

With that said, we might be able to -- What would people prefer? If we were to close red porgy during the grouper spawning closure season to harvest, would that possible allow to -- That would kind of achieve what it sounds like Myra is telling us that we need to achieve, and it would almost immediately, if we're not fishing all year, go to a one fish per angler per day limit, and so I just wanted to throw those couple of items out there on the table.

MR. HULL: Thanks, Robert. I'm glad you did, and, you know, the bottom line is the council is going to have to reduce -- I will just speak for the commercial sector, but they're going to have to have a 68 percent reduction in the landings, and so, I mean, there's a lot that has to be done to reduce by 68 percent. They're going to be required to do that by the Magnuson Act, and so I was looking at what you suggested.

If you went back to -- We used to have a closure January through April, and, just looking at the numbers, you would save, commercially, 50,000 pounds that were harvested, looking at the information provided, if you went back to that, and so you would save 50,000 pounds there. If you went to a rest of the year, eight months of the year, commercially, and you had a fifteen-fish limit, basically a bycatch fishery, that would be a 72 percent reduction, and so, I mean, I think that's where this is headed.

I think that's what the council is going to be looking at, and it's kind of -- You know, we can sit here and talk about what we think, whether we believe it or whether we need more habitat, or whatever we think is really going to fix this, but, in the meantime, the council is asking us, hey, we're going to have to do some major management here and reductions, and what do you want to do?

From my point of view, I want to keep the fishery open, if I can, as a bycatch fishery, commercially, and, if that entails closing up for the spawning season closure, which makes sense, if the fishery is in as bad shape as they say it is, and a very small bycatch limit per trip, so that we can collect data, and I never want to see a closed fishery ever again, totally closed, because they never get back open, i.e., red snapper. That's just some thoughts, and we need to recommend some of what they're going to have to do here, because, just by saying we're going to reduce it by a little bit, that isn't going to work. They're going to have to reduce it by these massive percentages. Bobby, you're up. Are you there? He must still be having problems. Rusty Hudson, you're up.

MR. HUDSON: Good morning. Two things. When we're talking about the commercial, we're talking about virtually a real-time census, at least by the week or so, and so we're able to track that catch, no matter where it goes down to. The other thing that I wanted to speak to, and it was brought up just a little while ago, about closing off bottom, well, we closed off some serious bottom just recently, from Port Canaveral north, to almost St. Augustine, 225 to 330 foot, the Oculina Coral 8 extension on the north.

What I'm bringing that up for is real simple. When I fished out there for my snowy and blueline tile, I would catch big red porgies, and that area around the base of the Oculina coral, the pinnacles, or steeples, whatever you want to call them, and they vary in size, but, right at the base of those steeples, that natural bottom that Bob Lorenz brought up, are the big porgies, along with some blueline and snowy and stuff like that.

The MARMAP chevron traps, because of the Gulf Stream, has never, and cannot, sample that area, and so what we have is a big closed area to anything except drift fishing, and there's no anchoring, and there's no grappling, and there's no longlines, and there's no nets, et cetera. That is a huge area that nobody is going to be able to explore, unless they've got cameras, and that's usually the independent people that would have to do that, and I'm not sure how good the light is and stuff, and they would have to work it out and be able to do that, just like I've been trying to get them to do and deal with the various size snowy that are found in that, because you've got the small females, and you've got some big males, but, when our snowy got offshore, they were virtually all big males and separate from all this other stuff.

Back to the red porgy, and there's definite stuff out there, but, back inshore, I have to agree that this just total closure and most closed for red snapper has definitely impacted, in our minds, those smaller black sea bass, and, in all probability, the small red porgies and certain small sized, definitely under any minimum size for hook-and-line, and so I just wanted to throw that information out there.

MR. HULL: That's good information. Thanks, Rusty. I see Myra put the slide up there, and it's right there. We've got to come up with these type of reductions, and so that's what we're looking for. Think about that. Bobby, we'll try you again. Are you there? Okay, Jack, you're up.

MR. COX: My experience with fishing on the pink snapper, I like to call them, because they're really not a porgy, in my opinion, and they taste much better than a porgy, but they're an incredible fish, and they're very important to the commercial and recreational sector, and we've got to get it right. Unfortunately, this fish has struggled for a long time. I can just remember, back in the 1980s, back inshore, in sixty or seventy feet of water, and catching three to five-pound pink

snappers, and we don't have that inshore fishery anymore, because there's so much effort on a lot of our stuff inshore.

We just recently had a boat that was in 300 feet of water, and he was offshore of the big rock, and had about 400 pounds of great big -- I mean, in two trips, he came in, I know back-to-back trips, with about 300 or 400 pounds of great big old red porgies. I mean, they were seven and eight-pound fish, and we still have that fishery, but it's just in the deep water, but, you know, it's just alarming that we have to do this huge reduction like we do. 70 percent is tough, and, Jimmy, you're right.

The last thing that I want to see happen is any fishery close, and so, on the commercial side, we've got a good record. We've got good data, and we do the logbooks, and I just -- You know, I'm always just concerned, when we do things like this, how much effort is going on in the recreational sector, and it's just not -- We're just not getting the data that we need and getting it right, and so my thought always goes back to how do we fix that, and it's important, when we get talking about stuff like this, but I will move on from that, because that's an ongoing topic, and I think we're working on it, and we plan to do better and better, and I get it, but let me just say, Jimmy, that I agree with you.

You know, I'm a long way from where you guys are, and it's important to you as well that we keep the fishery open, and maybe we need to go back and revisit some spawning closures, because that's the first thing we could do to repair fisheries when they get in trouble, but I certainly would love to see this thing -- If we're going to take that kind of reduction, go to some sort of bycatch fishery, just because we are catching these big fish in deep water when we're out fishing for vermilion. You know, we don't want to try to put a fish back, if we can help it, and especially those big fish like we're catching in that deep water, and so I want to think about it.

I want to reach out to a couple other guys, while we're having this conversation, and just see what people are thinking, and I don't even know how to crunch the numbers to see what our season would look like to stay open. You know, we've got the right amount of permits in our fishery, and we've got -- In the commercial fishery, we've got about 500 snapper grouper permits, and we're right where we need to be, as we're going through these reductions and things, to keep a viable fishery for our commercial guys, but, in terms of a bycatch fishery, I am going to spend a little bit of time, before I want to make a motion, on the commercial side and see what people are thinking. Thank you.

MR. HULL: Thank you for that, Jack. I think I agree, and, if you -- If we're going to be making a recommendation to the council, I think that's going to be one of the things, is to do analysis on different scenarios, such as, if we went to the spawning season closure with the shallow-water grouper, it would coincide with it, and then have a trip limit reduction to the levels that it takes to get to the reductions that we need, and what are we looking at? Is it fifteen fish per trip with that season closure? Can we then keep a bycatch fishery for eight months out of the year? Does it work, and so that's the kind of stuff I think we're looking at. Robert Lorenz, you're up.

MR. LORENZ: Jimmy, since there is going to be some type of what I would call draconian measure, ultimately, that's probably going to come out of this, in order to -- We can talk a lot, but I would like to provide a little focus of consideration of the recreational fishery, and, in that way,

just to put something on the board for people to start throwing darts at, or endorse, I would like to make a motion.

MR. HULL: Okay. Why don't you start crafting that? Here we go.

MR. LORENZ: All right. **Close the recreational fishery for red porgy in synchrony with the grouper spawning season closure. Then the council loves options, and I would like to then put two options for take within this motion. In association with that, when the fishing season for red porgy is open, Option 1 is a limit of one fish per angler per trip. Option 2 is two fish per angler per trip.**

That would sit with something that the scientific folks and the staff can run through their statistical programming on what kind of reduction that would be, but those are the two things that I would like to put on the table that are relatively straightforward and present it as a motion.

MR. HULL: That's a really good start, and so, in that motion, when -- The key is when the season is open, and it could be, from what we saw in the presentation and the information, that the season could be a single two-month wave, and so that would mean, with the reductions that are going to be necessary, you may only have, with the projections, which, of course, recreationally is tough to deal with, but you're looking at potentially a two-month season, and, in that season, you're going to have those limits, potentially, as options, and so I don't know if you want to put that a little more -- Clarify it, to where you say when red porgy is open, and so that would be, when that is determined, how long that opening is going to be, and so if you're good with that.

MR. LORENZ: Thank you, Jimmy. The spirit of my motion is that my hope is that, when the number crunching goes on, if porgies are closed through say May, and then, maybe with the selection of one fish per angler, once it does open, it will be open for the rest of the year, and a big part of the take is going to be July and August, and that will still exist under my scenario, but, with one fish per angler from then on, it could smooth it out, to allow the fishery to remain open for the rest of the year, and so the spirit of my thing was, once it opened -- With this option, what kind of reduction would we get if, when it opened, and we opened porgy, that we just let it run until the end of the year. I am guessing there is also going to be an ACL attached, and so I guess --

MR. HULL: Okay. Let's go to James Paskiewicz. Go ahead, James. There is a motion on the board, if you want to address that or some other comment, and I think that we need to address the motion, but go ahead, James.

MR. PASKIEWICZ: I just need a little bit of clarification here about what the new target number is going to look like, combined for recreational or commercial or split 50/50. I mean, are we looking at a number that needs to be around 100,000 pounds between both sectors combined?

MR. HULL: Myra is going to answer that.

MS. BROUWER: Thank you, Jimmy. I have brought up the slide that has the recommendations from the SSC, and so, as I stated during the presentation, the council can't go above the recommended level that the SSC has put out there, and so, for 2022, that would be 75,000 pounds. Now, the council can always ask their SSC to reconsider, and they have to have some rationale for

asking that. These numbers here are the catch levels that came out of the stock assessment, and so, for 2022, you're looking at a total ACL of 75,000 pounds, as of right now.

MR. PASKIEWICZ: Okay. Just so I can help further the motion on the table here, do we have a number of recreational trips associated with the months that the grouper fishing is open?

MS. BROUWER: Here's what I have showing landings by these two-month waves, and these are data from 2017 through 2019.

MR. PASKIEWICZ: But that doesn't necessarily indicate a number of recreational trips to go fishing.

MS. BROUWER: Correct. I don't have the number of trips for the recreational sector, the way you're describing.

MR. PASKIEWICZ: I just think it's going to be hard to calculate the total number of fish that's going to be landed to get to the projected number if we're unclear about the recreational pressure, and I know that we have been kicking this back and forth, and we are really trying to address this, but it's just hard for me to understand how exactly we're going to be within the new management criteria if there's just this giant question-mark looming, and so I think it's really hard to move forward.

I mean, it is a drastic cutback, without a doubt, only opening the red porgy when grouper season is open, and, I mean, I certainly think that that would help, but I just -- Without nailing down the effort a little better, it's going to be really difficult to really see how that's going to extrapolate itself, and one more thing is I would totally support a bycatch-type fishery for the commercial sector. I mean, we do have -- I mean, it's basically eliminating itself, and so, if the number has got to be small, let's just take small numbers throughout the course of the year, and the bycatch -- I think that's where we need to be.

MR. HULL: Thank you, James. Randy McKinley, you're up.

MR. MCKINLEY: Thank you, Jimmy. I agree with what Bob said for recreational, but, for commercial, I have talked with quite a few captains, especially the dayboats, the one or two or three dayboats, and all of them unanimously seem to -- They would rather have that small bycatch throughout the time period and not have that closure, going back to that closure, in January through April, even if it's ten fish or fifteen fish or twenty fish, whatever it is, and that would just be so much better than having those discards in January through April, when we run into a lot of them. That's it.

MR. HULL: Right on, and I see, in her comments, that she has noticed it's important to the AP to keep the commercial fishery open, even at reduced levels, and you're taking it even further, that, even if you had to reduce the trip limit down from very small numbers, to keep it open during what we used to have as a spawning season closure, and so you're opposed to the spawning season closure, even if it's a very small trip limit.

MR. MCKINLEY: Absolutely. Absolutely.

MR. HULL: Okay. Rusty Hudson, you're up.

MR. HUDSON: One of the things that I think should be examined, and Ken Brennan can make it happen, is the headboat reports and the number of red porgy that are reported by those headboats. We know that that's a bigger for-hire vessel, but, if they're going to be reduced down to like the suggestion of one during the non-spawning season, or whatever, that little bit of analysis may be insightful, versus the MRIP reports of estimates.

I think there is some charter boat stuff out of South Carolina that might reveal some red porgy landings, and the one thing I have not heard brought up here is I know that we have our traditional January through April for our shallow-water grouper, other than red grouper, which just recently got expanded to South Carolina and North Carolina for the month of May, and so that's like a five-month closure for spawning for South Carolina and North Carolina, and I don't know how everybody wants to discuss that, because that affects the commercial as well as the recreational, and I'm just throwing it out there.

MR. HULL: Thank you, Rusty. Dick Brame, you're up.

MR. BRAME: Just in general, and I think it would be useful here, I would like to see the PSE of these recreational estimates, because, if you've got a low PSE, you've got more confidence in your data than a PSE of 80 or something, but I can just tell you -- I agree with -- I like Bob's motion, but I've got a feeling that it's not going to get us to the 70 percent reduction. I mean, whatever we do, if we meet the required reduction, it's going to leave a mark, and it's going to be a seasonal closure on the recreational side. You're not going to get there with a lower bag limit, and you're not going to get there with a size limit, and that only leave a season. I would certainly like to know the PSE of these estimates.

MR. HULL: So would I, and I'm sure staff is trying to find it, to see if there is one, and we can look at it.

MS. BROUWER: In the document that you guys have in your briefing book, I don't have PSEs by year, but I do have them averaged for 2015 through 2019, and it's 44.66 percent.

MR. BRAME: One thing that folks generally don't realize is the actual standard error is twice the PSE, and just keep that in mind.

MS. BROUWER: Jimmy, I just want to bring to your attention that I don't think this motion has been seconded, and so we've been having discussion, and I'm not sure how you want to proceed with the motion that's on the table.

MR. BRAME: I will second it.

MR. HULL: Okay. There you go. It's now been seconded by Dick.

MS. BROUWER: Thank you.

MR. HULL: Yes, ma'am. Dick, those are really good points, and the uncertainty in the recreational numbers -- We all -- I mean, it's so uncertain, and there is uncertainty everywhere.

There is a lot of uncertainty in this assessment of this animal too, but it is what it is, and so it's been seconded, and we continue to talk about a lot of things and this motion that's on the table that's now been seconded. Tony Constant, you're up, sir.

MR. CONSTANT: One thing that I have found is that, when the board is asking for a 70 percent reduction, they're not going to bend until they get real close to that, or at it. With the current motion, based on what we're looking at currently in the fish limits, a two-fish reduction is a 33 percent reduction in that, right off the gate. If you combine that with one-quarter of the year, that's a 25 percent reduction on that closure. The two of those, we're looking at 58 percent, I believe. If you went to one fish, that's a 66 percent reduction in your creel. Coupled with a spawning closure, it should be well over the 70 percent mark.

My experience with dealing with flounder, and flounder is in the same shape, and they're dealing with it the same way, a 72 percent reduction. If we combine the creel along with the closure, we should be tapping around that mark, and, according to the total pounds, we were looking already at a reduction of I believe it was 122,000 pounds to 70,000 pounds, but we're dealing with a 70 percent reduction off of that. I believe we can get there with something similar to this motion.

Even at the 2 percent, we're getting close, and one thing I believe that we need to address is what Rusty has been saying, and a few other people, but, you know, a lot of this fishery has been hurt because of the red snapper. We need to look at this with bigger -- Take our blinders off and look at the whole fishery a little bit harder, and possibly combining the closures, I believe, it will help a lot, the spawning closures.

I don't think we're going to manage this without a closure, and I don't think anybody above us will go that route, and that's going to be on the table to start with, but, if you combine these issues with the red porgy and the sea bass along with the red snapper, I think they're all affiliated, and, if we don't start managing them that way, I don't think we're ever going to get there, and it's just like I've heard three or four times, and that is, is this particular fish going to be able to be managed, and it may not be, if we don't start letting some of the red snapper get caught.

Over to where Harry was talking about, habitat, I think expanding habitat is very important to take into effect, and I think the states alone are doing that, and I know CCA South Carolina, coupled with DNR, has put in four offshore reefs in the last year, and they're planning on two more, and all of those are in over 100 feet of water.

They have also put in a near-shore reef, in about thirty to forty feet of water, in every county on the South Carolina coast in the past three years. Florida is doing it as well, and I think that is going to start growing, because of the methods that we've had on fundraising in order to get to this point. I don't know that the habitat -- That it could be calculated into the motion to manage, because that, I think, is a solution for the count to go up, but, with the motion on the table, I think we're getting close to that 70 percent mark. That's it.

MR. HULL: Thank you, Tony. I appreciate that. Chip, you're up.

DR. COLLIER: Thank you, Jimmy. There are a couple of questions that were brought up during your discussions. As Myra mentioned, the PSEs were about 40 percent for red porgy and, doing



it on an annual basis, from 2014 to 2017, the PSEs were in the low thirties. In 2018, the PSE was around 80 percent, and then, in 2019, the PSE was 42.

As far as federal trips, or trips in federal waters, there are about four-million trips in federal waters that occur in the South Atlantic region, and then, if you add all ocean trips, that bumps up to around thirty-million trips that are going into federal waters, and that's based on the MRIP estimates, and those aren't just trips that are targeting snapper grouper species. Those are trips going in the ocean, and so we don't have it by species, and we could break that out in further detail later, but that's just what we have right now, from a real quick examination of the MRIP site.

MR. HULL: Jack, are you there?

MR. COX: Yes, Jimmy. Well, I guess I need to kind of craft some kind of motion here for the commercial side, and I was just trying to swallow this thing here, this big reduction, and it's -- You know, Jimmy, you know how important it was to get red snapper reopened, and we were closed for a long time, because we weren't able to get any data, and we had to rely on data that just was not exactly what we wanted, but we did get it opened, and it took longer than it should have, and I don't want to see that happen with this fishery. With that said, I think it's important that we keep the fishery open on some kind of basis, and so I'm prepared to make a motion on the commercial side.

MR. HULL: Hold on one second. I suppose we can have a couple of motions going on the board, crafting them. Is that okay, Myra, or should we dispose of the first one?

MS. BROUWER: I think that would be the protocol, Jimmy. We have to dispose of this one that's on the table in order to start another one, or that would be my preference anyway, so that I can keep up with you all.

MR. HULL: Okay. So, Jack, hold off on that.

MR. COX: Jimmy, I apologize. I didn't even see that. I was talking to some commercial guys, and I've been running back and forth to the other phone, and so I apologize.

MR. HULL: So we'll get back to the commercial side. Let me read the motion that we have before us, and let's see if there's any opposition to it or if there's any more discussion on it. As I said, this is a motion, and, obviously, it's to the council, to get some ideas out there, and, obviously, both sectors want to try to keep open, as much as we can, I believe, regardless of the reductions that we have to take.

**The motion reads: Recommend closing the recreational fishery for red porgy in synchrony with the grouper spawning season closure when red porgy is open. Consider one fish per angler per trip or two fish per angler per trip, whatever would work out with the analysis.** Does that read the way you want it to read, Robert and Dick?

MR. LORENZ: It reads the way I want it to read.

MR. HULL: Okay. **Is there anyone in opposition to the motion that's on the screen?** Raise your hand. I don't know if Rusty is in opposition to it or if he just wanted to speak, and so let me settle that right quick. Go ahead, Rusty. Are you in opposition to this?

MR. HUDSON: **No, I wanted to speak, because of the discussion after the second motion, and it should read "with the shallow-water grouper spawning season closure", and, yet, I have not heard any discussion about the May portion of the red grouper closure that recently went into effect, because that affects South Carolina and North Carolina, or if you're just talking and you might need to put the dates, January 1 through April 30, and that's the normal historic shallow-water grouper spawning.** Thank you.

MR. HULL: Okay, and so, if we put in "shallow-water grouper spawning season closure", I like that. I think it's -- Yes, that's good. How about you, Robert? Are you good with that?

MR. LORENZ: **I agree to amend my motion with that language.**

MR. HULL: Good. **Is anyone in opposition to this? Raise your hand. I don't see any hands raised, and so we have made that motion, and that will go forward to the council and be in the discussion minutes.** Moving on, Rusty, go ahead.

MR. HUDSON: The second part, the a and the b, we're just letting the council discuss that and get back to a choice later?

MR. HULL: Yes, and I think that's pretty obvious that that's what is going to happen. They're going to try to find a way to keep the fishery open with whatever limits they can do or seasonality.

MR. HUDSON: Right, but that one view that we had of the recreational catch, that July to August wave, that looked like the pink period.

MR. HULL: Yes, sir, I agree. I think that -- Myra, could you scroll up just a little bit, where I can see the AP comments? So far, we've got AP comments to close the red porgy season during the grouper spawning closure, and we've encapsulated that below in the motion, and bycatch allowance for the commercial sector, abundance of red snapper could be impacting the red porgy population, the abundance of red porgy has declined inshore, partly because of increase in effort. We still find large fish in deep water when fishing for vermilion snapper. It's important to the AP members to keep the commercial fishery, open at reduced levels. Conduct analysis with a closure that coincides with the shallow-water grouper closure and a reduced trip limit. Then, for the recreational fishery, we have the motion, which goes right along with a lot of the discussion.

I mean, we can keep talking about this, and we can make a motion, and I think, Jack, now would be the time, if you wanted to make a particular motion in reference to the commercial sector, and we didn't talk about -- You know, there's other options there and questions that were brought forth to us. A couple of them were getting rid of the sector allocation, and, I mean, I personally wouldn't want to see that, and I want to keep it separate, but somebody else may want to say something to that, but the -- Jack, it's in your hands. You said you wanted to make a motion.

MR. COX: Jimmy, we've had a spawning season closure for red porgy for a long time, and obviously it didn't do a whole lot to help, and my question is are we really getting that spawning

season right? When is that spawning season? I'm going to have to talk to somebody in the science community and just make sure that that is -- What months are they? Are they actually January through April, or is it some other time, and so I'm starting to question that.

Moving on to the motion, I think we've always got to protect the spawning season, and I think, if we could find out one or two months that they're in peak spawning, and, if we need to close it, then we'll close it, but I certainly don't think we need to close it for four months, and it doesn't seem like it helped then.

**My motion would read that, for the commercial sector for red porgy, we would have a trip limit of twenty-five to sixty fish, and, of course, staff will have to do some analysis, to see how that would look and how much time we could get out of it. There would be some options, a range of options, and the council will do what they need to do for that, once they get the analysis.** That would be my motion. I mean, it's pretty simple. A twenty-five to sixty-fish bycatch fishery, and that would be whenever peak spawning is not taking place. That's it, Jimmy. Thank you.

MS. BROUWER: Jack, did I capture that correctly? Did you want to include that this should be away from the peak spawning season, which kind of implies that -- Are you suggesting that we figure out when the peak spawn is and prohibit harvest then?

MR. COX: Myra, exactly. I am questioning now -- I don't want to see it closed for four months if we don't have to. I certainly don't want to see it closed for four months, and, as a bycatch fishery, you need to be able to land those fish when you're out snowy fishing, and we snowy fish in the winter. You know, that's January through April. If we're interacting with those big fish -- We don't catch many of them when we're snowy fishing, but, you know, they will catch some when they go out to the deeper water, and I want to make sure that we get our spawning season right. I don't know when it is, but I'm starting to question that we don't need it closed for four months, and that's for sure, and it may be some other time other than the winter.

MR. HULL: I see Todd has his hand up, and he may be able to educate us more for this motion. Todd.

DR. KELLISON: Thanks, Captain Jimmy and Captain Jack. Good morning. I'm not sure that I can educate, but I wanted to just say that, as all this discussion has been going on, I have been looking to see what files I have on red porgy and then starting to do some searches, and so the couple of papers that have reviewed so far report, for the South Atlantic, that peak spawning is -- Well, spawning is winter months, but peak spawning was February through March, but that's a pretty dated paper. The timing is similar for the northern Gulf of Mexico, and so it looks like they're pretty consistent across those two regions.

I just wanted to note that I'm going to keep looking, and there's a couple other papers that I can think of that I don't have on my computer, but I will track them down while this discussion is ongoing, and, if the discussion has passed, I will report it to Myra, so she can communicate it, if I find more updated information.

MR. COX: Todd, thank you for that, and, Todd, that's going to be very important for the council to get that information when they look at -- You know, when they start trying to craft a motion, and

let's take all the resources that we have, and see if we have anything updated on it, and, if we don't have to close it for four months, let's not, but let's try to find certainly the best time of year to close it. Thank you again.

MR. HULL: Thank you very much, Todd, and, Jack, as to your motion, I would just comment that, even with a closure of say just those two months -- Just looking at the analysis that I've seen from the presentation, you're still going to have other months that you're going to have a closure under your scenario of twenty-five to sixty fish, because it's just not going to get it done. It would have to be -- Anyway, it goes along with what we're saying, is we need to try to figure a way to keep it open, if we can. Rusty, you're up.

MR. HUDSON: Thank you, Mr. Chairman. I hope that everybody takes into account, on this commercial, that our gray triggerfish, our red porgy, our vermilion snapper, and our snowy grouper are all commercially operated under a split season, and the reason was to be able to balance out those catches, and you will see that the red porgy is almost double for the second half of the year, as far as the allocation currently, versus the first half, and so that is going to have to have further dialogue, because I'm not sure if twenty-five to sixty fish will do it, or fifteen fish will do it, and I think we're kind of just throwing darts at the moment. Thank you.

MR. HULL: Thank you, Rusty. Randy McKinley.

MR. MCKINLEY: Thank you, Jimmy. I was looking at the numbers too, and I would rather see -- I mean, it looks like it's going to have to be something maybe like fifteen fish, fifteen to twenty fish, across-the-board, throughout the time, and I would agree with Jack that, if we found out exactly when the spawning season was, if it was a month or so, or whenever it was, we could close it then, but we do encounter them a lot when we're fishing for -- The triggerfish and b-liners come back in in January, and we encounter them a lot, and not out on the break as much, but in the 120 to 140 foot, and this has nothing to do with that, but I would just like to say that a fisherman came in last week and had four big red grouper, and they were full of eggs, and so everything is not set in stone. I mean, they do spawn at different times, and I'm just throwing that out there.

MR. HULL: Thanks a lot, Randy. Yes, there is new information coming in all the time about when these fish are spawning, like what you just said, and there is things that the council is going to have to look at, updates and things, and maybe the spawning months could be changed, need to be changed. James, you're up.

MR. PASKIEWICZ: I did want to second the motion of the dart that's in flight here. Clearly the numbers are going to have to be determined, as well as the closure for peak spawning for that species, but I did want to second that motion.

MR. HULL: Thank you, James. Chip.

DR. COLLIER: Thanks, Jimmy. I was just reviewing a dissertation that was published I guess back in 2013, and now Nikolai Klibansky, who works with National Marine Fisheries Service, did his PhD on red porgy spawning, and he indicated that the spawning cycle for red porgy was from November through April.

MR. HULL: Thank you, Chip. All right and so I'm going to read the motion and make sure that it's good, and then we'll see if anybody opposes it. **Motion for the commercial sector to consider a range of trip limit options, twenty-five to sixty fish, and consider a closure only during peak spawning. Is there anyone that opposes this motion?** Raise your hand. **I don't see any hands raised, and so that motion passes.**

All right. Is there any further discussion on porgy? We have got a lot of comment up there, and I think we've summarized our feelings pretty good, and the council will hear from us and go forward with what they need to do. Myra.

MS. BROUWER: Thank you, Jimmy, and thank you all for the discussion. I know this is not a pleasant thing to do, and the council will appreciate your input, and so, at this point, let me bring the agenda back up and see where we are. I believe we are on track for the best fishing practices discussion, and let me just check in with Cameron, to see if she's ready.

MS. RHODES: I'm ready, Myra.

MS. BROUWER: Okay. Do you want control, or do you want me to pull it up for you?

MS. RHODES: I'll take control.

MR. HULL: Rusty, go ahead.

MR. HUDSON: One thing that I need to let you know is I have to finish my Atlantic blacktip review, and it starts at noon, and I saw the shark depredation portion of the schedule, and it looks like we're going to potentially get to that, and I have to really engage the scientists on the blackfin, and so just a heads-up, in case I'm not around, and maybe someone can text me, because I will keep the phone so I'm paying attention.

MS. BROUWER: Jimmy, I just want to clarify that that presentation is scheduled for tomorrow. Our speaker had something else going on today, and so she will not be available until tomorrow morning to give that, to present that, to the AP.

MR. HUDSON: That works good, because I don't have -- The shark thing ends this afternoon. Thank you.

MR. HULL: Back to staff.

MS. RHODES: Hi, everybody. Thanks for having me, and I'm just going to go through some of our best fishing practices campaign updates rather quickly, and I just wanted to give you guys a quick overview of some of our outreach and communications strategies since that Snapper Grouper Regulatory Amendment 29 was in fact implemented earlier this year, during the summer, and that amendment resulted in folks being required to have descending devices onboard and readily available for use when fishing for snapper and grouper species in federal waters of the South Atlantic, and it also had some other requirements associated with it, including some circle hook regulations that went into effect at the same time.

I am just going to walk through some things, and then we'll open things up for discussion at the end of the presentation, and I'm really looking forward to hearing from you all about how you interacted with this campaign, if you did at all.

For starters, we're really lucky to have lots of folks engaged in outreach and communications at the council office. This is certainly not a complete list, and there are lots of other folks who engage in outreach and communications, and you guys work with Myra all the time and she is actively involved in any kinds of products that we'll put out, anything related to snapper grouper or any kind of amendment she might be working on, but, for the purpose of this discussion, I just wanted to reiterate that I am Cameron Rhodes, and I'm the Outreach Program Coordinator for the South Atlantic Council.

We've got Kim Iverson, who is our Public Information Officer, and both of us are responsible for outreach and communications, typically in a more general sense, and so, rather than focusing in on specific project needs, we often are working to promote any kind of outreach or communication need on behalf of the council, and typically related to regulatory changes or amendments, things along those lines, and then we also have staff who are more geared towards certain topics.

We've got Julia Byrd and Allie Iberle, who are both with the Citizen Science Program, and they are both responsible for outreach and communication on behalf of the program and its associated projects, and then we also have BeBe Harrison, who is the MyFishCount Project Coordinator, and she works really heavily to promote MyFishCount and get that into the hands of app users, and many of you, I'm sure, are quite familiar with all of these different programs and projects that are underway, and you've been briefed on them many times in the past, but, for new folks, the Citizen Science Program deals with different kinds of projects that can help fill data gaps, while the MyFishCount project is geared toward private recreational fishermen and provides fishermen the opportunity to give us a little bit more information about their fishing trips and their catch. I won't go into any more detail on those things, but I just wanted you guys to see our faces, since we're not all together in person, and it's nice actually being able to put a face to the name.

Our staff are certainly not the only ones who are involved in outreach and communications on behalf of the council, and you all are actively engaged in that on our behalf, and so, as advisory panel members, you are our ambassadors, and you share information with the members of the public, and then you bring that back to us for discussion, and so you're actively involved in any kind of outreach or communications strategy that the council might have, especially when we're talking about certain fishery needs and getting people involved and engaged.

You all are very much a part of that, and we're very grateful to you for your work, because we know it can be a lot of pressure and a lot of communicating with folks who might not necessarily want to hear news about the council, and it can sometimes be contentious, but we're certainly really grateful to you for your role as ambassadors, and we wouldn't be able to do what we do without your help.

We're also fortunate to work with lots of different partners, and they help us with outreach and communication, especially when we're talking about messaging and making sure that everybody is clear on what we're trying to get out into the hands of the public, so that nobody gets confused, and this was particularly important when we were working through that best fishing practices campaign that we launched earlier this year and into the summer, and we were focusing on

descending devices, but we had to work with many different partners in order to make sure that the messaging that was coming out was as clear as it could be at the time.

We had to go through this rather quickly, as you can remember, when the descending device requirement was put into place. It went into effect on July 15, which was right in the middle of the two red snapper recreational weekends, and so that generated lots of interest and, in some ways, lots of confusion too, and there wasn't much time in between the announcement of the requirement and the actual implementation of the requirement, and so we had to work really quickly, and we were lucky enough to have many different partners who were directly involved in that process and making sure that we got clear messages out to members of the public and tried to get them the information that they would need in order to exercise best fishing practices while also staying within the confines of these new laws.

For starters, we had initially put together a best fishing practices webpage. With the help of many of our partners, and with folks like you, we brought some of our best fishing practices webpage tools to different advisory panels for their review and comment, and we were lucky enough to be able to rely really heavily on some of the resources that were already developed by state agencies. If you haven't had a chance to take a look at our best fishing practices webpage, I would definitely strongly encourage you all to take a look around and see the different kind of tools that are on there, and we don't focus exclusively on the use of descending devices or circle hooks or things like that, and we also cover a whole gauntlet, range, of different kinds of best fishing practices that were initially put together by the folks at FishSmart.

For those who are unfamiliar, FishSmart is really a campaign, or a program, that works with science-based best fishing practices and tries to encourage folks to use those best fishing practices in order to improve the survivorship of released fish, and so, working with FishSmart and our state agency partners, we were able to put together some pretty neat tools on our website, and I definitely encourage you all to take a look at them.

You will notice we've got some real sweet graphics here, and these graphics were courtesy of Allie Iberle, and she's got a great eye for any kind of graphic design, and we were able to put together some of these icons, which you will see across all of the different best fishing practices resources that we have put together, and hopefully that will bring people all back to one location. You know, it kind of makes everything have some kind of brand associated with it, and we're hoping that will continue to ring a bell with folks, and then, eventually, they will find their way back to our council webpage.

We also put together a best fishing practices wallet card, and this was courtesy of Kim Iverson, and it's a really great idea, and we were able to send over 25,000 of these wallet cards out. We were working with state agencies and council members, and some of our advisory panel members as well, to help us understand the best tackle shops and marinas for us to send this wallet card out to.

The wallet card features our best fishing practices fish, which has some of our icons on it, and so, again, you will notice that this will pop up in lots of different places throughout this presentation today and the different resources that we have created, but it features this fish on the front, and it will hopefully grab some attention. We think it's a pretty sexy design, and then we've also got, on the back, some information about these new requirements, as well as information on where you

can go to get other resources and how-to videos and different kinds of things that we now have available on our website, on that best fishing practices webpage.

These were distributed to over sixty tackle shops and marina sites that were recommended to us, and we put in phone calls to each of those sites and worked with them on the number of different wallet cards that we should send to them and any other materials that might be of interest, and then we also worked with the four state agencies in the region and sent many different wallet cards out to them, so that they could be disseminated to port agents and to different folks who might be interacting with members of the public, whether it be at an in-person outreach event or something like that.

Then we also were able to work with the United States Coast Guard, as well as the NOAA Office of Law Enforcement, to get them cards, so that, if they do conduct boardings, they can have these wallet cards on-hand. Maybe, rather than giving somebody a ticket, they will be able to give them this wallet card and say, okay, go ahead, and, next time, make sure you have this onboard, and visit this website for additional information, and so it's really a nice tool to get everybody on the same page, and they're really cheap for us to print, and we have another 20,000 ready to go, to distribute to folks, and we will be doing follow-ups, come January 1.

Once we have a new year, we'll be checking-in with people, to see if they need additional wallet cards, if they need any other resources, to help make sure that people are aware of the regulations and these requirements and that they're not just tied to red snapper season. These apply throughout the year when fishing for snapper and grouper species in federal waters, and so I definitely wanted to drive that message home, and we'll be working with tackle shops and marinas in order to do that.

We've also been really lucky, in that we've been working with different industry partners, in order to try and get these wallet cards, as well as maybe some stickers, into the hands of folks who actually have the ability to make some waves in the community, and so they have a lot more clout than I would say that the council is able to muster up, and we are a federal agency, by nature, as far as the public is concerned, and so it can be difficult for us to garner support for members of the public without the help of industry partners to help drive these messages home.

Andy Loftus, with FishSmart, had mentioned that, in the past, that the FishSmart program had worked with Plano Fishing, in order to distribute a best-fishing-practices-related sticker in a line of tackle boxes, and so those stickers were distributed to anybody who may have purchased one of those tackle boxes, and it seemed to be a really effective way to get that information out there, and so, with the help of the American Sportfishing Association, we identified around fifteen different companies and manufacturers that we thought might be interested in partnering and sharing some best fishing practices information with members of the public and with their customer base, and, right now, we're still working on that effort.

It will be ongoing for a while, and we have Engel Coolers that has agreed to send out the best fishing practices wallet card in some of their products, and so that's really exciting. We sent them a thousand wallet cards, and hopefully those are getting into the hands of people that are buying Engler Cooler products, and so that's a really great win for us, and we're excited to see the direction in which that goes.



Then we've got a couple of other companies who have expressed interest, but we're still trying to work out the details of how we can get those wallet cards into the hands of those manufacturers. Given some of the issues that have been presented with manufacturing as a result of COVID-19, there have been some additional complications to all of this, but, regardless, many of the companies that we've reached out to have been willing to share information across social media channels, which is also hugely impactful, and so we're really looking forward to seeing those efforts, and some of them have already done that, and so it's been really nice to see this community-based approach to getting this information out to people.

We created a bunch of different swag items, in order to get best fishing practices out in front of folks and make sure that they're aware of the different kinds of requirements, but also some of the quick-and-easy things that they can do in order to improve the survivorship of released fish, and so we've got this really nice measuring tape here, and it's a sticker, and you can just slap it onto the side of your cooler, or on your gunnel, and this sticker was put together by BeBe Harrison with MyFishCount, and so this sticker has MyFishCount information on it as well as best fishing practices, and we think it's a really nice way for folks to get this information in a clean, simple approach, and, as you can see here, again, those icons that were created are appearing here as another way for us to keep that branding moving forward.

We have got the sticker here, that you can see right in the middle, and that's our best fishing practices fish that appears on many of our different webpages that are relevant to best fishing practices, as well as all of our different swag items and resources, and so this sticker is real nice. If anyone wants one, let me know. I would be glad to send it to you, and we're hoping to get out in person and be able to distribute these things, but, right now, with COVID-19, we've been pretty reduced to doing everything virtually, but we're hoping to eventually get back out there and be able to share these different resources that we've created with people.

As you can see, this sticker here was on Captain Mark Phelps' vessel during the red snapper season, and so we were really excited to see that up and being promoted with his customers, as well as anyone else who might choose to fish with him on even a fun fishing day, and so it definitely seems to be a good item for us to have in-house, and then we've also got our best fishing practices and MyFishCount sunglasses pouch here, and so this is great for cleaning any kind of Garmin you might have, or your sunglasses, and it's a nice little pouch for you to keep things in, and so we're just trying to drive some of these best fishing practices messages home in a way that's a little bit more exciting and fun than a webpage that people might take a look at.

We also created some DIY videos for how you can go about making your own descending device, and we had heard from members of the public that they couldn't find descending devices, that they weren't on the shelves in tackle shops, and they were really started to get worried about the upcoming requirements and not being able to have something on-hand, and so we made sure to let people know that you can create your own and still be within the confines of the law, and you didn't have to go out and purchase a commercially-manufactured device, and you could instead use some of the items that are already available to you in your tackle box.

This video is currently available on our YouTube and from our website, and then we also saw, shortly after this, when working with our state partners and communicating with them about this upcoming issue, that Florida Fish and Wildlife Conservation was able to go ahead and create their own video to this effect, and that video is a lot fancier than this one. This one is about as bare-

bones as you can get, but it still gives people the information they need, and so, fortunately, there are a couple of different ways that folks can get clear direction on how they can go about creating their own descending device for use when fishing for snapper and grouper species.

We also upped our Facebook presence, and so we were pretty active. I mean, we're pretty active on Facebook as-is, and we post, typically, five days a week, but we made sure to up our best fishing practices presence to two to three Facebook posts per week, through the month of July, and so that covered the weeks before implementation of the requirement as well as after implementation of the requirement, and so we really wanted to make sure that we focused in on July, and we have continued to post about best fishing practices pretty much once a week since then, and so it's still on our radar, and we're still driving those best fishing practices messages home.

As a result of our presence on Facebook and working with our different partners, we saw information appear on different channels, and so, as you can see here, Keep Florida Fishing, the South Carolina Department of Natural Resources, Mustad, and *Sportfishing Magazine* all shared information about best fishing practices, and this was done through news releases that we sent out, newsletter articles, and we really tried to disseminate as much information as we can, and, fortunately, these different platforms picked them up and ran them on their own social media channels, which was really exciting to see, and we definitely saw that as being a strong benefit for getting this information out.

We saw lots of different articles about best fishing practices, and they were all in the news, and some were news releases that were picked up and sent around, and then we also had different blogs that popped up, and much of this was probably driven by the red snapper season as well, and so the fact that the red snapper season and the descending device requirements coincided definitely, I think, brought up lots of different interest in making sure that people knew that these requirements were coming, although it did present a number of challenges, as I mentioned earlier.

Then we participated in a number of live shows. We were on the Kelly Kelly Show, which is a radio show, actually based out of Tampa, but it is hosted by our Outreach and Communications Advisory Panel member Doug Kelly, and then we were also on Fly Navarro's No BS Tour. Christina Wiegand, who was the staff lead for Regulatory Amendment 29, which is the amendment that actually implemented the requirements for these descending devices and hook requirements, she was on that show with me, and we were able to sit down and chat with Fly about some of these new upcoming best fishing practices requirements.

Then Kim Iverson was on Fox 24 Charleston, talking about best fishing practices, and so we tried to get out there in some ways that are not necessarily our typical avenues for promoting certain management measures or changes that are coming up or letting people get a heads-up, and this has been kind of a different style effort for us, and it certainly seemed to be beneficial.

We've got a lot to do, moving forward, and, now that we've established some relationships with these tackle shops and marinas, we certainly need to foster them and make sure we maintain those relationships, and the same thing goes with these manufacturers. We want to continue to stay in touch, continue to communicate about council issues and management concerns, and make sure that folks get the information they need from different kinds of tackle shops and marinas and manufacturers or companies, whatever they might be, that probably carry a little bit more credibility with members of the public.

We're going to continue to distribute those wallet cards, where needed, and we're also going to look into different ways for us to continue to participate on some of these live shows and get information out into magazines and work with our agency partners in order to try and continue to disseminate this kind of information. Then, hopefully, as things improve over time, we're looking forward, to, again, being able to attend club meetings and in-person outreach events, where we can communicate with people in-person, and that's the most fun part of our job anyway, and so we're really looking forward to seeing that change soon.

With that, I will turn it over to the AP to walk through any questions you might have for me, and feel free to ask, but I'm also going to pose a series of discussion questions here, as you can see, just asking you what your experiences were like, and please feel free to be completely honest. If you didn't see anything about these new best fishing practices requirements, there's no need to be embarrassed, and please let us know. It just indicates that we have a lot more work that we need to be doing, and that's totally fine, and so please feel free to share with us your experience from this summer and with this whole new descending device requirement situation.

The questions we've got here are, are the council's best fishing practices efforts, as well as efforts underway by other agencies, reaching fishermen? Are you seeing an increase in the use of descending devices in your area? That's a big one, and we would definitely like to hear from you guys on that. Are you seeing a difference in the availability of descending devices at tackle shops in your area? Is there any confusion among fishermen regarding the new descending device requirements, and so all of that is really crucial information for us, and, with that, I think I'm going to go ahead, and I will make sure that I pull up that hands-raised document, and then you guys can give us some feedback on this and let us know what your experiences were like this summer and moving forward.

MR. HULL: Thanks, Cameron. That's really good, really good. You guys have done a great job, in my opinion, on this, and so we'll look to see if we have some AP members that want to comment. I can tell you that, from my perspective, you are reaching the fishermen, and I can't really speak for seeing an increase in the use of descending devices in my area, but I know that everybody knows they have to have one that I speak to.

I have heard some people comment on the use of them, and so it is being used, and, yes, they are available in tackle shops in my area, and, as far as confusion on the requirements, no, and I think that everybody knows that, if they're going to prosecute the snapper grouper fishery, they have to have one onboard and ready for use, and so I think you're getting there, and you're pretty far ahead on it, but you just need to continue on with your efforts, and I think they're real good. Do we have any other comment from other AP members, especially from the recreational side, that you're seeing? Andrew Fish, you're up.

MR. FISH: I would mirror what you were saying, Jimmy. I think there is a lot of talk about it, and people are aware.

MR. HULL: Thank you, Andrew. Chris Militello.

MR. MILITELLO: I think the problem initially was to find them. First of all, to find them, but, second of all, they were really expensive to begin with. I mean, it was -- Some of them were over

a hundred dollars, and so they were just venting the fish, I think, initially, but it's definitely more effective, I believe, and, now that we've got to do it, it's just going to be a matter of time with getting the word out.

MR. HULL: Thank you, Chris. David Moss, you're up.

MR. MOSS: Thank you. It has definitely improved, and it's still not -- I know, Cameron, it's not where you want it to be just yet, and COVID certainly hasn't helped. It's getting better. I know a couple of tackle shops down here sell them, though they don't necessarily know what it is that they're doing with them, and so kudos to you guys though. I mean, this is really great stuff, and I might know a guy, actually, who probably wants to work with you further on this, and so let me know.

MS. RHODES: Thank you. I think I know that guy, too.

MR. HULL: Thank you, David. Tony Constant.

MR. CONSTANT: I see most everyone on the recreational side that is bottom fishing using the descending devices, with pretty much positive response. The people I've asked about it had it prior to when it was mandatory, and there's not a lot of them at the tackle shops, but they are there, and so, that said, our local shop has a couple of brands. I'm not seeing any of the stickers and things like that at our tackle shops though, and so that might be something, in the Beaufort area, that we might need a couple.

MS. RHODES: Where is your preferred tackle shop in Beaufort?

MR. CONSTANT: It is Beaufort Boat and Dock, and it's actually located in Port Royal, South Carolina.

MS. RHODES: I think we sent some stuff their way, but we didn't send them a large stack of stickers or anything like that. The wallet cards should be there, but I can definitely follow-up with them, and, if they've run out, I can certainly send them more.

MR. CONSTANT: Okay, and most everyone between say Hilton Head and the Beaufort area shop that shop, and so that's a good one to go to.

MS. RHODES: Okay. Perfect. Thank you.

MR. HULL: Robert Lorenz.

MR. LORENZ: Cameron, I'm going to just bring up another thing, and maybe it belongs on Myra's listing on the input of the recreational management topics webinar, but one thing I think really would be useful to add, when you go further with best fishing practices, would be -- To me, it's also ethical fishing practices, or let's make it positive ethical/smart fishing practices. I think one of the next programs, or efforts, I would like to see for the recreational fishing community is more education on really ethical or smart practices with respect to how many fishermen procure their own species for cut bait when fishing offshore, and I brought this up just likely in pink

snapper, or red porgy, which is going to come with these rather draconian cutbacks, is a thirteen-inch minimum means that you don't cut the ten-incher up for bait.

Maybe I have even been one of them, and this dawned on me yesterday, with the recommendations for the conservation of those various fish, and I think I saw black sea bass somewhere, which I myself have chopped up, and I said, gee, I wonder if I should be doing that or not, and it didn't seem important to me, and so even somebody like me may not know about every species that really we should be leaving alone that we're utilizing it for cut bait.

It would be interesting to start maybe developing some lists, or some outreach, and some articles on that, but particularly bring about an education to the fishermen on what all this management process means, particularly with limits and releasing undersized fish and with particular --Almost, it would be wonderful to have a hot list on, absolutely, please, if you're an ethical angler, never use these species for bait, and, again, I would point to today's example of pink porgy. If you're going to chop it up for bait, send it back to the bottom, even if you have a legal-size one, and so I don't know where that fits, but just some effort or attentions might be the next thing you add on, and I know you do have the motto of fish for open species, and so it's kind of in there, but there's also bringing to the attention of many folks, perhaps, what fish we really shouldn't be cutting up for bait. If we don't want it, throw it back. Thank you.

MS. RHODES: Thanks for that, Bob. I think that's a good point, and we can certainly run some articles or little outreach items related to that. One thing I will point out is that it is illegal to do that, and so those are federally-managed species, and so you're not supposed to cut them for bait, and so that's something that's already set in the regulations, in some ways to try and prevent people from doing that, but, in my own experiences, I've also seen that people really aren't aware of those regulations, and so they do cut certain species for bait that are known to be really good at capturing certain -- Really good-eating fish.

I definitely think that we can do some things on our end to try and, again, drive some of those messages home and make sure people are aware of what the regulations are, that you can't use that fish for bait, and it has to remain head and fins intact if you're going to harvest that species, and so that's something to keep in mind, but I definitely think we can throw some things out there to that effect, and possibly Kim and I can work together on maybe doing a newsletter article or some kind of blog that can address that, and we'll try to get that circulated among some of our partners and different magazines that we work closely with.

MR. LORENZ: That would be great, Cameron, and, just to address the entire AP, I just want to give a shout-out to you, while they are listening, because I've been on this AP for about five or six years, and the downloading of these documents that we are to review prior to this AP used to be, I thought for me, and I'm not swift on computers, and it's a tedious process, but you have made it so simple. I was on two computers in about two minutes, and so thank you very much, and I want everybody to know what a major force you've been in making that so easy. Thanks.

MS. RHODES: Thanks, Bob. I can't take much credit on that, but I appreciate the comments. That was really driven largely through Amber VonHarten, who is no longer staff with the council, but, when I came onboard, she was my supervisor, and she really made sure to keep that not only easy for you guys, but it also makes it a whole lot easier for me, and so it works out for everybody, but thank you. I appreciate those kind words.

MR. HULL: I think we all agree with those comments, too. Jack Cox, you're up.

MR. COX: Cameron, thank you. That's good stuff, and I know you guys have been working for a while on it, and you and Kim are doing a great job, as always, and that stuff is kind of getting out to the commercial guys, but I think it could be moved along in a different way, where they could maybe have some of that swag on the boats, and stickers and things, and cards, and I was just wondering if you could maybe send out the snapper grouper permit holders some of that stuff, being that you're not able to get out and go to see us in person, and I know we're saving a little bit of money by not having council meetings and some of these meetings in person.

MS. RHODES: I love that idea. I hadn't thought of that before, using the permits as a way to send people some things in the mail, and so I will definitely look into that. I can't see a reason why we wouldn't be able to do that, but I will look into it, and so keep your eyes on the mail.

MR. COX: Thank you. I will certainly put some stuff on my boat, and I know those guys will, too.

MR. HULL: Very good. Anybody else have comments? Anything else to tell Cameron? Okay, Cameron.

MS. RHODES: Thanks, Jimmy.

MR. HULL: Myra, back to you. It's getting pretty close to lunchtime, and I don't know what you want to do, as far as where we're at, and I will wait to hear from you.

MS. BROUWER: Jimmy, I was thinking we could go ahead and take a lunch, so that we can get into the input on the recreational topics right after lunch, and so I was going to suggest maybe coming back around one o'clock, and give everybody a good bit of a break, and you all worked really hard this morning, if that's okay with you.

MR. HULL: That sounds great to me.

MS. BROUWER: We'll start signing people on and unmuting and doing all that business at 12:30.

MR. HULL: Good deal, and so we'll see you all back here between 12:30 and 1:00, and we'll get back started. We're going to have a lunchbreak. Thanks. Harry, you had your hand raised. What's up?

MR. MORALES: I just wanted to let Cameron know that, in the Beaufort area, descending devices are a bit difficult to get, and so some of my customers -- Like Beaufort Boat and Dock Supply, they don't have any at all, and they are indicating that they're difficult to get, I guess because of COVID, and so I just wanted to give her that feedback. Hilton Head is the same thing, and they're scarce.

MR. HULL: Right on. I'm sure she heard that, and she may get back to you. I appreciate that, Harry.

(Whereupon, a recess was taken.)

MS. BROUWER: Welcome back, everybody. I hope you had a nice lunchbreak and are ready to get back into discussions here. According to our agenda, we have covered Items 1 through 5, and so we're getting ready then to move to talking about recreational management topics. I have a presentation for you, and I'm going go ahead, again, and hijack your screen here, just for a little bit.

We are going to tag-team, Brian Cheuvront and I, on this presentation. This is something that -- Basically, it's to update the AP on where the council is in regard to topics like recreational reporting and perhaps consideration of a stamp, revisions to accountability measures for the recreational sector, and these are topics that the AP has discussed at length in the past, and there are two amendments that were started, and then they were kind of put in the background for a while, because the council -- Just other priorities, not enough time, and so they are going to be convening again, the council is, on Monday to talk specifically about issues related to management of the recreational fishers in the South Atlantic, and so we wanted to allow the AP to chime in and bring you guys up-to-speed on where we are with these two amendments and some other issues and then allow you to discuss and recommend or bring anything up that you would like the council to have for their discussions that are coming up on Monday.

With that introduction, I think the first chunk of the presentation is where Brian comes in, and so I will go ahead and mute myself and let Brian take over, and I will be advancing the slides for you, Brian.

DR. CHEUVRONT: Great. Thanks, Myra. You may remember -- If you've been on the Snapper Grouper AP for a while, you may remember discussions in the past about recreational accountability measures, and this is Regulatory Amendment 31, and the council set it on the shelf for a little while, and I'll explain, when we get there, why they had done that.

First off, I want to make sure that we all understand what we're talking about when we mention accountability measures, and so they are generally short-term regulations that go into place, and they get triggered, and that's the term that we use, when they try to keep the total catch under the annual catch limit, and, in the South Atlantic, we typically have, for most of our fisheries, and not all of them, but most of them, we have the annual catch limit, which is the total amount of given species that's allowed to be caught in a given fishing year.

We divide it up between the commercial and the recreational sectors, and each sector knows how much they are allotted to catch in a given year, and so what we try to do then is to have these accountability measures that, should something happen, and a sector exceeds how much it's allowed to catch of its ACL, then something needs to happen to keep the fishery from becoming overfished or allowing overfishing to occur.

Now, typically, accountability measures, or AMs, fall into two categories. One is in-season AMs, such as closures, and now we're talking about just recreational accountability measures here and not commercial ones, and you might be wondering, well, why aren't we talking about commercial ones too, and pretty much almost all of our commercial fisheries have an in-season accountability measure, which is an in-season closure, and it's trip tickets that allow that to happen, because trip

tickets are turned in on such a regular basis, and commercial fisheries are tracked very closely, and it's pretty easy, or it's a lot easier, to close a commercial fishery in mid-season.

That's really hard to do though for most recreational fisheries, because, you know, MRIP, and the nature of how that works, in two-month waves, it can take several months before the actual landings estimates arrive after the fishing has actually occurred, and so you have this time lag in between, and so the council is trying to figure out what is the best way to deal with accountability measures for the recreational sector, and they feel they pretty much have it under control for the commercial sector, and so the one way is to look at in-season measures, such as closures, like is done currently in the commercial fishery, or the other type is what they call post-season measures.

Those are actions that are done to try to correct overages, and so, for example, if the recreational sector was to exceed its ACL in a given year, then, in a subsequent season, they have -- Some aspect of that season might be modified to help cover those overages that occurred in previous seasons, and the most common ways that those overages could be accounted for would be through either shortening the season or reduced bag or vessel limits.

Now, remember that accountability measures are short-term. They are only to make up for what happened in that season previously, where there was a problem, and these are not permanent changes that would occur in a fishery, and they are designed to be just sort of a short-term fix, as a correction, to get you back on course, so that you continue to stay under your sector ACL.

On this amendment, and all of the amendments that the council develops, they always have what's called a purpose and need, and so the purpose of the action, and so why the council is considering doing this, is to -- The council is concerned because the accountability measures in the snapper grouper fishery especially -- They are kind of all over the place. There's some similar language, but they're not the same, and so there is some confusion on the part of many fishermen, because they are different, and so there is some problems with that that the council is considering addressing, and so they want to look at standardizing the AMs across species and also consider looking at improving the predictability and stability of the fishing seasons, and there's an action in the amendment right now that looks at that, and we'll get to that in a few minutes as well.

They feel like the need for doing this is, well, they want to maintain optimum yield, which is getting the most out of the fishery that benefits society, and so they want to maintain optimum yield in recreational fisheries while limiting discard losses and promoting social and economic benefits to recreational anglers.

What about other species? I mean, it's not just snapper grouper species that have these issues with AMs, and so, when the council was looking at what to do, they decided, from the very beginning, not to include the coastal migratory pelagic species, and we're talking about the mackerels and cobia on the east coast of Florida, and that cobia on the east coast of Florida is still managed by the council.

Those accountability measures are handled very differently than all the other species that the council manages where there is a recreational component to the fishery, and those species are also jointly managed with the Gulf Council, and the issue there is that, if the council, this council, the South Atlantic Council, was to take that on, anything that they would want to do would also have



to go through and be approved by the Gulf Council, and it's a much longer process, and it takes a bit more time to get through that, and so they have decided not to tackle that one at this point.

Originally, dolphin and wahoo were considered as part of this amendment, and it was originally a joint amendment for dolphin wahoo and snapper grouper, but the dolphin wahoo AMs were moved out of the joint amendment and put into Dolphin Wahoo Amendment 10, and that amendment has been being developed all along, and it's actually further along in its development than this one, and so the actions and the alternatives that went into the amendment were originally the same as the ones that are here now, but they have been developed a little further, and there is no guarantee that the council is going to do the same thing that they're doing in dolphin wahoo with what they're going to do in snapper grouper, but the council is actively working on AMs for dolphin wahoo, but, just because that's what they're doing there, it does not mean that's what they have to do for snapper grouper.

Like I said, there's three actions that are being considered in this amendment, and the first action would consider removing all in-season closures for all snapper grouper species, or another option that's in there is remove them for all species except for those species that are in a report that goes to Congress every year that lists which species are overfished.

Now, when you think about it, it's really kind of a logical thing. If you know a species is overfished, and you know that you're going to exceed your ACL, it's probably a really good idea to try to do everything you can to stop fishing on it, if you know you're going to exceed your ACL. That's one of the options that is considered in this first action, and so it's an acknowledgement that in-season closures are pretty difficult for snapper grouper species, but that is still an option.

The second action gets really a lot more complicated, and it considers revising the post-season AMs, and the first thing that's on there is remove all post-season accountability measures. Now, you can't have your cake and eat it too on this. You notice, in Action 1, one of the alternatives was to remove all in-season accountability measures, and one of the alternatives in Action 2 is to remove all of the post-season accountability measures. You've got to have one or the other. The Magnuson-Stevens Act requires that you have accountability measures for every species, and so the council will not be able to choose to get rid of accountability measures altogether. That's not an option that they can consider.

If they choose that option in Action 1, then they can't choose it in Action 2, and so, depending on which way the council wants to go, that will determine what they can do with those options, but, if they do decide to go with post-season, which means after-the-season-is-over accountability measures, what happens is there is -- Something has to trigger the accountability measure, and so this first part of the action looks at, well, what is it that's going to trigger that? How do we know that we need to apply the accountability measure?

Some of the things that the council is considering right now, and it's all variations on these three things that they're considering now, is one is that the three-year average exceeds the annual catch limit, the recreational sector annual catch limit, or the sum of the past three years of landings exceeds the sum of the last three years annual catch limits, and now you're going to say, well, wait a minute, and isn't that the same as the one just above it, and not exactly, because, sometimes, from one year to the next, depending on the management for a given species, the recreational sector

annual catch limit could change from one year to the next, and so that can affect how you would determine whether you have triggered the accountability measure.

Then another option that the council is considering as a trigger is that, before the accountability measure for the recreational sector is triggered, the combined recreational and commercial landings have to exceed the total annual catch limit, and that means what's allowed for the entire fishery, and the logic behind that is a dead fish is a dead fish.

It doesn't matter who killed it, and so let's say, for example, there was a species where the recreational sector exceeded its ACL, for whatever reason, but the commercial sector did not, and the commercial sector's underage was enough to cover the recreational sector's overage, and so, even though the recreational sector went over, the commercial sector went under theirs, and, when you put them together, the total ACL was not exceeded, and so, technically, no biological harm was done to the stock, and so that is the logic behind there. Why punish a sector by reducing their landings, potentially, in a subsequent season when in fact no biological harm has come to the stock of fish, but that's kind of the logic that's behind that.

Then the last part of this action is, okay, if a post-season accountability measure is triggered, there is language in there now that says monitor the stock for persistence in increased landings and then also to reduce the ACL by the amount of the overage in the following fishing season, to just reduce the amount of the ACL, or reduce it by the amount needed to keep the recreational ACL from being exceeded.

Now, you might think those are the same, and they're not. There is a little bit of a word difference there, but, again, the way that the council would probably do that is either through shortened seasons or lowered bag limits or some kind of vessel limits or a combination of those sorts of things, and so that's what the council would have to figure out.

Then the third action is the council is going to look at requiring specific start and end dates for additional species, and, right now, black sea bass has -- When that season starts, if it's projected not to last the entire fishing year, they will tell you not only when the season starts, but they will project out when they think the season is going to end, and, of course, we're all familiar with red snapper, and that is advertised in advance exactly which days you can fish for red snapper, and I'm talking about on the recreational side here.

The idea was should this be done for additional species, and, also, there was the notion added to this of whether it should just be done for those species where the ACL is exceeded in at least one time in the past three years. Now, you might say why would you want to know that information, but, if you're running a for-hire operation, for sure, you would really like to know what you could offer your customers, for example, if you knew when that season was going to end in a given year, and so, if you had that additional information, that could help you with a business plan, and so that was some of the logic that went into considering this action as well.

The timeline here is this amendment began in March of 2018, and, in January of 2019, the amendment was taken out for scoping, and so it's been out to the public, and people have been asked for ideas and what they think about it, and so the council had worked on it for the better part of 2019, and they had come up with these three actions, and they decided, in December of 2019, a year ago, that they would wait to go too much further with this, because they had all of those MRIP

revisions that were happening, and they were just going into effect, and they wanted to find out what exactly were those changes going to be and how much effect was this going to have on potential overages and things with the way people were fishing now, as well as what's going to happen with allocations between sectors.

The council is going to talk about this amendment on Monday, at the recreational topics meeting, and, if they decide to pick it up and keep working on it, the next steps would be that they're going to prepare a draft amendment, and that will look just like a regulatory plan amendment that they will continue to work on, and they would further develop the actions and alternatives, to get them to be more -- They will work out the details and do the data analysis to find out how would things go, based on the different alternatives and things that they asked staff to analyze for them.

Just to give you a recap of the past input that you all have given and have received, I gave an update on this amendment in your meeting of April in 2019, and the AP basically said, you know, one way to really help out here with this accountability measure issue is that, if there was a recreational permit, or some way to improve recreational accountability, there would be less need for accountability measures. Then, at the meeting a year ago, the AP got another update on where we were with this, but the council hasn't worked on this since that meeting in October of 2019.

We've got some questions that we came up with that we would like to get some specific input from this AP, if that's possible, if you would all like to weigh-in on it. The thing that brought this whole thing up was the discussion of consistency across accountability measures, but, if you do that, it might have to result in some more conservative measures for some species, like having to end up with lower catch levels if the accountability measures were all the same.

If you go with consistency, it might affect catch levels, but, if less consistency in accountability measures is okay, or if it's better, would it be better if it results in fewer year-to-year changes in bag limits and seasonal closures or paybacks or overages and things like that, and so it could end up with fewer year-to-year changes, because of AMs not being triggered. Like I said earlier, the Magnuson-Stevens Act requires accountability measures, and, like I said, there is the two kinds, the in-season or the post-season.

Does the AP have a preference for one kind of accountability measure over the other, in-season versus post-season, and, if you want to weigh-in even further on post-season accountability measures, does basically an in-season accountability, basically a closure as soon as they can, once they realize that the sector ACL is met or is going to be met, and so does the AP have a preference for things like a shorter season or reducing bag limits or vessel limits, but that may be just something that has to be worked out individually by species. Then the other question really is how important to know, at the start of a fishing season, exactly when it's going to close, and is this needed really for all snapper grouper species?

With that, maybe we could go to some discussion. Myra, is there a way that you can leave this slide up, and then you'll be able to look at raised hands or something like that, and then you can have the discussion? I will be glad to take any questions that people might have.

MR. HULL: Thank you, and I do see some raised hands already, and so we'll go right to that. Dave Snyder, you're up.

MS. BYRD: His hand has been up for a while, and so I'm not sure if he's running into issues or not. We'll try to look at that on our end.

MR. HULL: Right on. Rusty Hudson.

MS. BYRD: Again, his hand was up for a while, and so he may not be there anymore either, Jimmy.

MR. HULL: Okay. Bob Lorenz.

MR. LORENZ: I am here. To kind of kick it off for discussion among those that are in the recreational fishing sector, whether private angler or a charter captain, we have talked about this extensively, accountability measures, for some years, and certainly to have some kind of license or permit, or now some of us are speaking now about a registry for recreational anglers, to just help with general accountability measures out there, that has been discussed for many years.

For the newer members of the AP, I would like to just state what I remember has been talked about the most, based on the things that Brian has presented, and one is -- I heard overwhelming, from anybody running a charter business, that in-season closures, and so the accountability measure that involves in-season closures, is not what they would ever want or like, and they would actually prefer taking the pain next year, in the form of things like the paybacks or reduced bag limits, or maybe even increasing a species size.

The reason for that was this aspect of customers reserve for fishing, and they make a deposit ahead of time, and one of the worst things a captain wants to do is call a customer and state the type of fishing they wanted to do may be reduced or non-existent, and, consequently, have to find a way, for many of them, to refund deposit money, and so it seemed like that group, over the years, starting way back -- It goes back nine years, at least, and I feel like Robert Johnson would speak to this constantly, from St. Augustine, when he was on this AP.

The charter business did not seem to like it, and, for those of us in the private anglers who own boats, it doesn't affect us quite as strongly, other than, for many people, I wouldn't doubt that there would be some compliance issues, that they just find out and hear about it soon enough, but even some of us do arrange in advance for friends and families to go out on our boats, and so, with us, it seems like payback in a following year is the way to go.

With respect to what Brian said, I note that the Action 2 -- Wow, that's very sophisticated, and it might please people, but it seems very complex to execute, and so I kind of like the Action 1 to just keep it simple, and then, when you go to Action 3, I think there is some value, and we could talk about it, to set the seasons, if you can. Again, that helps people who are taking people fishing as a business, to know what the season is, particularly if you anticipate when it closes, and I think, and others can agree or disagree with me, but I think, for most people, and I would presume the charter industry and those of us that have our own boats, knowing when the season will end is good.

If you end it prematurely, that brings about negative emotion. If you think that the season can go on longer, I don't think there's going to be a charter captain out there that's going to get angry with the fact that he or she might be able to offer trips for a certain species for a little longer, and

so I would just like to bring that forward, more from what we have talked about in the past. Thank you.

MR. HULL: Thank you, Bob. James Paskiewicz.

MR. PASKIEWICZ: Thanks, Jimmy. My ears kind of went up a little bit when I heard a dead fish is a dead fish. Being in the commercial sector, and I'm speaking mainly with yellowtail snapper specifically, there's been a large gap in between what the recreational ACL is and what they are actually landing.

Science has shown that basically three-million pounds of yellowtail can be harvested, and 1.6 -- Let's just say a million-and-a-half to each sector, just for simple numbers, and the commercial sector, in the 2018/2019 season, we went over at 104 percent, and the recreational sector finished at 43 percent, and so my question is, with almost 800,000 pounds of the total ACL still remaining a viable number that could have been harvested, why is a dead fish not a dead fish when we're talking about commercial fishing?

I am not going to beat a dead fish on the matter, but my ears went up with that, and I wasn't exactly comfortable with that, because it seems like a one-way gate, and then, if the recreational goes over, and the commercial didn't, it's all okay. The other way, it doesn't seem that way, and what if we are grossly miscalculating the recreational landings?

In SEDAR 64, I believe, we're supposed to get a yellowtail stock assessment analysis here, and the council is going to take a look at that very soon, and what happens if we are determined that we are overfishing yellowtail snapper with consistently, on the recreational, landings showing 750,000 to a million pounds left on the ACL? These are the things that really concern me about the way that the recreational sector is reporting and what they are actually catching, and so it's really hard to determine what the best course of action is going to be if we're not seeing accurate numbers.

DR. CHEUVRONT: Because I made the comment about a dead fish is a dead fish, I would like to address the comment, if that's okay, Mr. Chairman.

MR. HULL: Perfect.

DR. CHEUVRONT: Specifically, in regard to yellowtail snapper, I know that your comments that you brought up -- The gate does work both ways, and the council has talked about doing exactly what you're talking about, considering on the commercial side some way of allowing the same thing to work if the recreational sector is not catching all of its ACL and the commercial sector goes over their ACL. If the total ACL is not exceeded, they are not going to reduce the commercial ACL, and I believe they haven't reduced the commercial ACL, and Myra can correct me if I'm wrong on that, in a subsequent season if the commercial sector has gone over its yellowtail ACL.

There has been some discussions about how to look at that issue, and I can't speak for what the council is going to do, and I believe it's something that they probably will take up when they look at yellowtail specifically, but there has been discussions in looking at allocations, because I've been working on allocations for the council, and one of the options that they are considering is getting rid of sector allocations for certain fisheries where there are issues like the ones that you

brought up, and so those are options that are on the table. They recognize that it's an issue, and they are trying to address that.

MR. PASKIEWICZ: If I may, really quick, Jimmy.

MR. HULL: Go ahead, James.

MR. PASKIEWICZ: Okay. I am not -- You may have misunderstood, and I am not lobbying for the gate to swing both ways. That couldn't be further from the truth. What I am saying is, if we have sectors, and we have ACLs for each sector, there should not be a fail-safe between the two. When recreational reporting and accountability comes online to its fullest potential, I fear that the recreational sector is way overharvesting their ACL, and it's been simple mathematical calculations based on trips that we see, the availability, the nice weather that we have in Florida, and especially in the Keys, to go out and overproduce on this species without any reporting really being done to guarantee that they're not, and so I am not asking for the gate to swing both ways.

I am saying that, if we have a decisive line between recreational and commercial, it needs to stay that way, but, if, with this recent study, or this recent stock assessment, our overall ACL goes down, and I want to know where science has messed up with -- I mean, are we catching more fish than what we're reporting, or was the stock not as healthy to begin with? I mean, it's kind of multifaceted, what I'm trying to say here, but it's just I don't think that, if we're discussing recreational accountability measures, that we should be allowing for the door to swing to just fix the other way into the commercial sector. I think that we have the line between the two for a reason.

DR. CHEUVRONT: Okay. First, I will apologize for misunderstanding what you were saying, but it sounds like then what you are really suggesting is that one alternative that the council is considering, which says that, as long as the total ACL is not exceeded, then the accountability measure would not be triggered, and you do not agree with that one at all. Am I correct in characterizing what you're saying with that?

MR. PASKIEWICZ: Correct. Yes, absolutely.

DR. CHEUVRONT: Okay, and so I think that's the important point that we need to capture here, is that, where there is sector separation, commercial and recreational, you're very much in favor of keeping that separation very strongly delineated, and is that correct?

MR. PASKIEWICZ: Absolutely.

DR. CHEUVRONT: Okay. Thank you for the clarification. I appreciate that.

MR. PASKIEWICZ: Likewise. That's why we're here.

MR. HULL: Very good. Rusty Hudson, you're up.

MR. HUDSON: Okay, and I've got two things to say. One is, over the past decade, particularly when Dr. Bonnie Ponwith was running the Science Center, suggestions had been made, although it has never occurred, that the recreational MRIP wave could shift from two months to one month,

but still require the same forty-day processing delay after each wave. That would help hone-in a little bit more on the recreational catches, as opposed to this two-month plus the forty-five days, which is three-and-a-half months, short of having some kind of census approach, besides the for-hire fleet, for the private fleet, and I know we're doing a little something at the HMS level with the recreational shark, but I'm not sure what all we can do here at the council level.

The other thing that kind of caught my attention was the slide that had to do with the coastal migratory pelagics and the Gulf Council being part and parcel of all our decisions, and that should have changed with our last few assessments for, in particular, king mackerel, where we now have Miami north and it's Atlantic stock, and the mixing zone is 50/50, and the Gulf is in the lead down there, and then the Gulf is in charge of the Gulf, and their stock assessment is now separate from our stock assessment.

The Spanish mackerel, open access permits, yes, but separate assessments, and now the cobia, based on genetics, Florida east coast all the way to Texas and cobia is Gulf stock, and then, over to Georgia north with their cobia, and so they're not really jointly managed as much as they used to be, is what I'm trying to say. Thank you.

MR. HULL: Okay. Thanks, Rusty. Dick Brame, you're up.

MR. BRAME: This discussion --- It has always occurred to me that it misses a central point. When the recreational fishery increases its catch, it's because of an increase in abundance, most likely. Recreational fishermen just don't go fishing more often for no reason. They often go because their buddy caught some fish, and they thought they could catch some fish.

The AMs are based on projections, because we do stock assessments every five or six or seven years, but we very rarely -- If we go over, we very rarely go back at the next assessment and see if we actually did go over, and so the point I'm trying to get to is we need some sort of index of abundance that needs to work with the AM, so that, when the stock increases, and you catch more than your ACL, which is based on a projection, but the stock is actually larger, and you caught more fish, but you're not overfishing, and you're not going over what would be the ACL, and so I think we need to have some sort of discussion about, at least for the important species, the dozen or so important species, some sort of index of abundance to compare to -- To see if you actually did go over and need to pay back, and you certainly -- The data we currently have, as Rusty pointed out, even if we went to one-month waves, it's very difficult to do in-season closures with the way we gather data now. You pretty much have to do post-season closures.

In-season closures cause what I call panic fishing. You tell people that it's going to close in April, I mean in September, and then start trying to close it in July, you will get an increase in effort, as people try to go fishing, and it's panic fishing. Somebody needs to write an article, but there was a great example of striped bass in the Roanoke back in the 1970s, and they were chasing their tail trying to close the fishery, and finally they just said we're going to have a forty-day fishery, and they never went over after that. That's all.

MR. HULL: Those are good points, Dick. Thank you. Jack Cox, you're up.

MR. COX: I am going to probably step on some toes here, and so I apologize, but I support in-season closures, and I will tell you why. If you pay attention to what happened to cobia, we had

an in-season closure, and, the following year, the accountability measure says we won't fish, and then we had Congress say, okay, no, and that's going to be an economic impact to the fishermen, and so we're going to open it up, and we're going to go fishing, and we did that, and look where cobia got us today.

I mean, we don't have a smidgen of the cobia fishery that we used to have, but I support in-season closures, because I think we're doing a good job. We're conserving fish, and we're not -- We've got a lot of fish stocks that are just not doing that good, and, if they were doing exceptional, or doing really well, then I would probably say, yes, let's move on and look at post-season closures, but, you know, for thirty years, I have sat down for two hours a week and fill out my logbooks, and I feel like that's an accountability measure for the commercial sector.

We're paying the price, and it's not fair when you have a sector that says -- For even there to be a suggestion that we share the fish, when you've got one sector working their butt off on accountability and then we have -- We had a visioning meeting that says, you know, we've got to figure out how many recreational anglers there are and how much pressure there is on the resource, and we're talking about a recreational staff where they're not doing it, and I think they're not doing it for a reason, but no.

I mean, I think that, as far as the commercial sector is concerned, we need in-season closures, and I think it's only right to do it for the recreational sector, and they're going to have to figure out a way to become more accountable, like we are, and I just -- You know, it fires me up. I mean, we work really, really hard on what we do, and it's time for that sector to do the same.

MR. HULL: Thank you, Jack. Harry, you are up.

MR. MORALES: Well, I guess I'm going to disagree with what I just heard. You know, the -- I haven't really considered the charter fishermen as recreational, but, if that's part of the group -- I know, and I support, charter fishermen professionally, and they are booking trips six to twelve months out, and so, for you to have an in-season closure, it is an incredible economic impact on their business, when, all of a sudden, they're going to have to tell their customers that they can't go fishing for what these people are going for.

I am, I think, greatly concerned that the professional commercial fisherman is held to a standard that is not applied, in any way, shape, or form, to the recreational fishermen, and you have no idea what the hell I'm doing out there, and you don't know when I have inexperienced fishermen that gut hook a fish and we've got to let them go, because we can't keep them, and they are just floaters, and there is no reporting on my end to tell you what it is that I'm doing, but, if I go deer hunting or whatever, I've got to tell you what the heck I'm doing.

Accountability measures for the recreational fishermen, to give insight to what the heck is really going on out there, is reasonable, and it's reasonable. I mean, we're not -- This isn't inshore fishing. I mean, you've got have a vessel to go fifty to a hundred miles out, where you're out -- When I go fishing, heck, I'm leaving the dock anywhere from three o'clock in the morning to six o'clock in the morning, and I'm not getting back until six o'clock at night, and it's a full day, and should I be telling you what it is that I'm catching? I think so. I think so.



If we're talking about protecting a fishery on all sides, then, yes, then accountability and reportability is going to be critical, and, without it, we're just guessing as to what it is that the amateurs are doing, and I will repeat again that I have a friend of mine, and I don't have a side sonar, and he just put one on, and he's like, oh my god, this is incredible, and so what's that going to do to the fishery? It's going to put more pressure on it, and, if we're going to put more pressure on it, wouldn't it be nice for everyone to know what that pressure is? That's my point.

MR. HULL: A very good point. Chris Kimery, you're up.

MR. KIMERY: I had some problems with audio when we first came back from lunch, and then I had myself muted, but, anyway, I sympathize with Jack and Harry both, to some extent. You know, it's been one of my complaints, since I've started dabbling a little bit and learning about fisheries management at the federal level, how unaccountable the recreational side is, and, to Jack's point, you know, the commercial guy -- I preach this a lot to my clients that don't have any understanding at all of fisheries management, but I preach to them, hey, don't bash the commercial guy, because most of what he catches is counted properly, and most of what he catches is utilized, and, on the recreational side, and I speak from twenty years of charter boat experience, there is a lot of fish that aren't counted, and there's a lot of fish that are wasted.

You know, I fish right at 200 days a year, right here out of Morehead and Atlantic Beach in North Carolina, and so see firsthand, and I am the charter guy that's going to keep fish if my clients want them, and I'm not going to keep fish to take a picture of them laying on the dock, and then they're going to end up tossing them or giving them away or letting them go bad in the freezer, but, back to the -- You know, trying to figure out, on the recreational side, how to be more accountable, and the logistics behind that are the problem, and, also, trying to convince people on the recreational side that there is benefits for us in having a more accurate count.

Now, some of these guys, these full-time commercial guys, and I really sympathize with them, because I come from a commercial fishing background, and they want a more accurate count on the recreational side, because maybe the recreational is catching more than is being noted, and I would have to agree with them, from what I see in my little area, and I think the recreational guys are catching a lot more fish than are being recorded, in lots of cases.

Of course, now, I'm only seeing a little tidbit of the South Atlantic, but, from what I see, I think I happens pretty regularly, and, like with Harry's comments, I mean, I agree with him, too. There has to be some way, and that's why I was so excited about the electronic reporting. There has to be some way to get better numbers on the recreational side, and, by doing that, there's going to be some cases where the recreational guy is going to shoot himself in the toes, and he's like, oh my goodness, and we've got to give up this because we're reporting properly, and that's going to happen, and there's going to be other cases that it's going to paint a more clear picture of how much of the resource is being absorbed on the commercial side.

The only way to get it more accurate is to have something more real-time, and, with that being said, once you get to that point, if you need an in-season closure, then, by all means, do it, because, ultimately, with the amount of pressure that's on the resource and the evolution of electronics and the number of boaters, the number of recreational fishermen, the increase in our population, all these things -- Before it's over with, if everybody doesn't learn to give a little, as far as what they take, taking less, and doesn't learn to give a little more, in means of reporting and logbooks and

being accurate and learning to properly handle and release fish and do these things, everybody is at a loss, and we all know that, and we all sit around and talk about it. When I use the phrase “we all”, I mean people in my industry, and my friends that are in the commercial industry, and we talk about it, but, until people make it second-nature to practice that, it’s not going to matter.

An in-season closure, if you’ve got proper reporting and it’s reported fast enough, like the bluefin tuna that I do, which is about the only commercial fishing that I do anymore, and it’s pretty real-time. Of course, they’re big fish, and they add up quick, and it’s not like counting snappers and bass, but, you know, it seems like, to me, the biggest problem on the recreational side is the logistics behind getting a proper count and training people that they need to do it.

Another thing I see, because I run out of one of the larger tackle shops in the area, and my slip is right behind the shop, and so I see a lot of people coming and going, and there are so many people that are just either, a, misinformed or -- I don’t want to use under-educated, but not knowledgeable enough about some of these new fisheries, and like there’s people now that bottom fish that couldn’t have done it twenty-five years ago when I was kid and we were running LORAN. They could have never figured it out with a paper chart and a LORAN, but he can go write a check for \$200,000 and get a couple of numbers off of somebody and buy a bunch of fishing rods, and he’s instantly a good grouper fisherman, or a sufficient grouper fisherman, let me say.

With all that increased pressure, there’s a lot of things that are missed. Like we spent all morning talking about red porgy, and I bet there’s a lot of people in the recreational sector that couldn’t identify a red porgy, and I know that sounds crazy, but I’m telling you that I see it all the time, and those little things are things that are hard to address, but they’re things that you need to think about when you’re trying to get more accurate reporting on that side, being recreational, and so I don’t know, and it’s a huge problem.

I sit around and think about it all the time, and I don’t know. I don’t envy the guys that are making the final decision in counting the fish, because it’s a very tough job, but in-season closures, if everything is counted right -- I mean, if we need them, we need them, and that’s just how simple it is, to me.

MR. HULL: Those were great comments, and I think you’re speaking what a lot of us have been saying for a long time also, and you just can’t -- There has to be a starting place here somewhere, and the AP has recommended for a long time that we need to at least get started on this and have some way to count the universe of people that are going into federal waters and private recreational fishing for snapper grouper species, and so hopefully we’ll get moving. David Moss, you’re up.

MR. MOSS: Thank you, Jimmy. The gentleman that just went before me kind of took the wind out of my sails a little bit, because he said a lot of what I was going to say, but, again, to reiterate, as far as in-season closures, that’s fine, if we actually know what it is that we’ve got to deal with in-season, which is very difficult to do with the way that we get recreational data right now.

To answer that first question of is it better to have consistent regulations between species, even if it’s more conservative measures, especially for recreational anglers, and I will probably step on toes, like Jack did, but I think that, yes, it’s better to err on the side of caution with something like that, and it’s -- For me, personally, if I get a chance to go fishing, I’m going fishing. If grouper is closed, that’s fine, and I will try to keep some mutttons or something else, but, for recreational

people, we're doing it as exactly that. It's recreation, and it's a good time. It's an experience, and, when we want to go fishing, or when we can go fishing, we're going to go fishing.

If something is closed, that's okay. We'll fish for something else, or keep something else, and especially with Regulatory Amendment 29 coming through with the descending device stuff, and, as Julia and Cameron do their good work of spreading the word of correct conservation and things, it's only going to make it that much better. We don't have to keep every single fish that hits the deck, and that's important to remember, but, again, unless we have a grasp on what the recreational take is, a legitimate grasp on what the recreational take is, then we're all going to be behind the eight-ball.

MR. HULL: Thank you, David. Randy McKinley, you're up.

MR. MCKINLEY: Thank you, Jimmy. A lot of the stuff has been said that I wanted to say, but I do -- We just can't make good decisions without having that accountability, and not just accountability, but verification. I mean, I sold tackle for thirty-one years, and I know what the recreational is doing, and a lot of them are not following the laws, and they're keeping everything they catch and stuff, diving and recreational fishing, and so you've got -- They've got to somehow put something at the inlets, if it's a small sampling or whatever, and find out what people are actually really doing and step up enforcement. I know that gets into a lot of money, but that's money that -- There is no way that just self-reporting is going to do it on the recreational side, and you've got to have verification, and I think that's necessary to move forward on this whole amendment.

MR. HULL: Bob Lorenz, you're up.

MR. LORENZ: I would just like to state two things. One is information. The National Academy of Science has been enlisted, by I believe NOAA or NMFS, but Luiz Barbieri had a meeting, about a month or a month-and-a-half ago, and Michelle Duval, who many of us know and was chair of the SAFMC for a while, and she was on it. I was asked just to speak and to make comments from the point of being a recreational fisherman, and so there is an effort out there. Essentially, the National Academy of Science has been contracted to improve MRIP, and so that's out there.

The next thing is -- This comment is more for SAFMC staff and Brian, but we can't stop the statement, and, as you can hear from all the people speaking, the number-one problem that exists is that we have been totally unable to get a recreational permit, license, or you can even call it a registry, out there so that you can contact certain people for critical species and know who they are that fish and be able to find out what they're fishing for.

The number-one -- You've heard it here from everyone, and Harry started the conversation, and the number-one problem with recreational accountability is you don't know who the private recreational boat guys are, what we're doing, and how much we're catching, and that has to be resolved. None of this is worth talking about with that being up there first, and that is job one, is to get that done, to get that license, permit, or registry, and then you can require us -- Pick us out, if you need a statistically-valid sample, to report what we're catching.

I want to be the first to say it now on the public record, and I am -- We are probably going to head, and this is what the council should think about. If you don't do it, I think we are very close to

having sector separation within what we call the recreational group. I am shocked to think that the charter boat captains that are now -- We're moving them more and more to accountability, with electronic reporting and all, and the headboats have been treated pretty much like commercial fishermen for years, and I am absolutely shocked that nobody has filed a lawsuit yet about the arbitrary and capricious fisheries management with respect to all the accountability that you have caused on the commercial, and we've taken it over to the headboats and then the charter captains, while letting the private recreational anglers, which are growing phenomenally, and with better and better and faster craft and faster electronics, to just do whatever they want and never knowing what those numbers are.

I am shocked they haven't, if need be, sued for sector separation, and I think you're going to hear it, and I think it's going to cause sort of massive turmoil within the recreational sector, and you will actually pit some of your anglers, like the private boat anglers, against the charter industry, and I think that mess is coming if we don't get our arms around the accountability of the private boat recreational fishermen.

I think the only reason it hasn't occurred, unlike so many of us that are private, is -- We have some powerful NGOs to speak for us all the time. They have pushed a lot of things through, and they don't. The charter captains and the headboats do not have enough of them together to amass that kind of -- I think it would be pushed already, but I see it coming, and I really wish it wouldn't have to. I would like to keep the sector all together as one, and I see the handwriting on the wall of people demanding, and maybe even trying to legally enforce, sector separation in the recreational industry. If we do that, look how complex it's going to be.

MR. HULL: Bob, very good. James Paskiewicz, you're up.

MR. PASKIEWICZ: Bob, that's a lot to chew on, and thank you for all of that. I mean, it kind of is what everybody wants to say, I think. For me, I just wanted to point out that there's been a definite shift between the approach between the way a commercial fisherman views any day, or any trip, that they're about to start on the water. I see more of my peers, as commercial fishermen, picking up plastics out of the water and being way more conscious about the trash that they take out with them comes back with them.

It's almost like the commercial sector is the way that we wanted our recreational sector to be when we started conservation, and now it's almost a complete role reversal. Nobody cares about the amount of fuel that's being burned on the water. Most boats have three motors nowadays, and it just seems like a blind ambition to just be out on the water and go kill something, kind of like commercial fishing used to be. I'm only forty-one years old, and I've been doing it every day of my life, basically, and I see a mentality shift between what was and what is. Commercial fishermen are not the same animal that they once were, and it does scare me. You know, we are heading down a path that is not good for fisheries, period.

MR. HULL: Thank you, James. Red, you're up.

MR. MUNDEN: Thank you, Mr. Chairman. After hearing all these comments, I will go back to what Jack Cox said, and I will support in-season closures as a management tool. They have to be timely, but it would help, along with things such as changes as bag limits and paybacks, and, with in-season closures, you could keep the fishery from getting away from you, or the landings from

getting away from you, and, oftentimes, you could have less-severe restrictions the following year, and so I think that in-season closures, as well as these other items, are good management tools for the recreational fishery.

MR. HULL: Thank you, Red. I am looking at the discussion questions that were provided, and I can see that, on the third bullet, the MSA requires that, if the council gets rid of in-season AMs, they must have post-season AMs, or vice versa. Does the AP have a preference? Well, it sounds to me like we're pretty split on that. It sounds like probably the commercial and others feel like in-season are where we should go, and some of the maybe charter boat guys say no, or people speaking for the charter boat guys say it would hurt us.

I don't know if we've answered that question, and there is these other bullet points here that I think we ought to look at real quick, like is consistency in AMs better, and so look at these real quick, guys, and, if we can give a concise answer, that would be helpful to answer some of these questions for the council, and, obviously, they are listening now to what we're saying, but let's try to answer a couple of these more specifically, also. David Moss, you're up.

MR. MOSS: Thank you, Mr. Chairman. I mean, it would stand to reason, as you were talking on that third bullet, that, if we don't figure out the in-season accountability measures, which I'm all for, but, again, only if we have the accurate and timely data, then we're going to have post-season closures, or post-season accountability measures, and it's going to have to be one or the other. For me, I would prefer timely data and in-season accountability measures, but, again, only if, and that's a big if, we can get the timely data. I just want to go back one step to something that Bob Lorenz just said and just echo my support, and I completely agree with him. If we don't get some sort of a handle on the recreational data, we're going down a dark and ugly road. Thank you.

MR. HULL: Harry, you're up.

MR. MORALES: While I greatly respect many of the things that have been said on this call, and you know my opinion as far as in-season closure, but I believe that we're probably heading toward a post-season closure with an in-season closure as a last resort, and I totally agree with the in-season reporting, and I'm going to be optimistic and believe that, at some point, we're going to get better in-season reporting, which would then allow for the first step of post-season adjustment, followed by in-season closure when absolutely necessary. I am totally in agreement with Bob when it comes to the panic fishing that occurs, especially on the recreational side. If you say that that fishery is going to close in the next month, you will see as many boats as possible out there trying to catch ahead of time, and that's my point.

MR. HULL: Thank you. Tony Constant, you're up.

MR. CONSTANT: As it goes back and forth, we look at ways to manage the stock, versus -- I would rather see a bag limit change versus a seasonal closure, even if it had to be in the middle of the season, if you have catch overages that we're reaching. Here again, it also goes back to the quick data, getting current data, but, if you have a fish that say has a twelve-inch limit that commonly grows to twenty inches, and you raise that creel size to sixteen inches, well, that's a 30 percent increase in management.

I would rather see some sort of bag limits or boat limits changed, and, when it comes to the recreational count, we've been talking about this for years, at meetings years ago, and I still would like to hear how. I would love to know how, because I think it needs to be done, and I agree.

We brought up the fact of like migratory birds, and the typical answer is they're going to lie to you, but why would they lie to you? It works for migratory ducks, or it seems to, and I don't know. We have to do something, but it's going to be a management tool on how we do it. How do you get that recreational angler to give you the answers and give it to you -- I think the timely issue will happen. I think that, when a recreational angler comes in, he'll fill out something and put it online within the next two days, but it's just a matter of how. That's all I have to say.

MR. HULL: Thank you. Richard Gomez.

MR. GOMEZ: I just got back in town here, and I didn't know if you guys had any questions for me on any of the fisheries, and then I was curious what fish we're talking about right now.

MR. HULL: Well, it's been a pretty long discussion, Richard, and we're talking about recreational accountability measures, and so take a look at the bullet points there on the screen, and then, if you have something to say on those, I think it would be good to come back. Go ahead, Jack. You're up.

MR. COX: It's been a great discussion, and there have been really good comments from everybody, and these fish are super important to all sectors here, and I think, at the end of the day, what we've got to do is figure out a way that works for all of us, because we're sharing the same pot, and we've got to do the right deal here, and, if there's something that we can do on the commercial side to help the recreational side, we're here and we'll do whatever we can. I certainly don't want to come at this just saying do what we do without help, and I think that's just where we're going to have to get.

Looking at these questions specifically, I think it's very important to have consistency for the commercial side, because there's a lot of regulations, and we're adding stuff, and we're doing so many things for each species that it gets really hard to keep up with. Even if you're on the council and you look at this all the time, it gets hard, or on the AP like we do, and you get out fishing and sometimes you've got to pull your app out and refresh yourself, but consistency is super important, even if it takes more of a conservation measure, and I think it's okay.

One of the things I like about in-season closures are things -- Like right now, and you look at the ACLs, and we're not meeting the -- We're not catching the gags, and we're not catching the red grouper, and we're not catching sea bass on the commercial side, and, at the end of the day, those fish stay in the water, and sometimes I try to look at that, and why aren't we catching those fish? Are we looking for something different?

We know pretty much, unless we have just terrible storms and hurricanes, what our season commercially is going to look like now. We get a pretty good feel for it. I mean, we've been doing this a long time, and it is important to know our season, and not as much as -- I know the recreational season is super important, because the way they do their business is much different than ours, but, for us, on the commercial side, it's super important that we're able to access some of the fisheries when we're accessing another and that we have those bycatch fisheries, and things

like the red snapper season is something that I talk about, and I hate the fact that we have a commercial red snapper season, and I wish it was a bycatch fishery, so that, when we interact with one and he doesn't do well, we could bring it in.

I was trying to touch on the questions and specifically what we're talking about, and, at the same time, Jimmy, I just wanted to say that I thought that everybody did a good job. This stuff is hard to do and talk about, and, anyway, thank you very much.

MR. HULL: Thanks, Jack. These questions are hard to answer, but it sounds like we've -- I'm sure that Myra has been taking notes and trying to capture everything that we've all stated, and, that way, the council can hear what we've been saying and make the right decisions from what they're hearing and what they know, and so it looks like we're done with this discussion. Back to you, Myra.

MS. BROUWER: Thank you, Jimmy, and, yes, I have been taking copious notes here on my end, and so, if it's okay with you, we'll continue with the rest of the presentation, the next chunk of it, and that deals with recreational reporting, which is a continuation of what you guys have already been talking about.

Let me update you on what's been going on with that, and I will get this discussion started, and BeBe Harrison has a nice presentation prepared for you guys to update you on what's been happening with MyFishCount, and, also, at the end of this presentation, I will give a short update of what's been going on with efforts to address the Section 102 of the Modernizing Recreational Fisheries Act of 2018, and so still a good bunch of stuff to talk about on these topics here.

Back in -- I can't even remember how long ago it was, but the council had started talking about a permit, requiring a permit, or reporting for the private recreational sector for snapper grouper, and you guys have been in the middle of all of those discussions, and I will recap here, towards the end, the input that you guys have provided to the council on this particular topic.

Staff prepared an options paper that the council looked at back in 2018, and that's -- The summary that I am presenting to you right now is what was included in that document, and so we haven't worked on it since then, but we did -- Chip Collier was lead at the time, and he consolidated a lot of really good information, pros and cons of various different things, looking at what's being done around the country, at the state level, at the federal level, in different types of fisheries, to inform the council's discussions on this topic.

A permit, obviously, would be a good way to narrow the sampling unit from all coastal recreational fishermen to only those that are targeting snapper grouper species, and so then you would essentially have a sample of fishermen that you could look at, and then, from there, you could begin to refine your estimates of catch and effort in that sector. It would also help increase sampling effort to improve the number of intercepts that we have per wave for the recreational estimates, and especially this is very relevant for what we call rare-event species.

A rare-event species is a term that we use to refer to those fish that are infrequently sampled, which, obviously, leads to higher uncertainty in the estimates that then result for that particular species, and so the other bullet that I have on this slide has to do with responding to input from stakeholders during the development of the vision blueprint, and I briefly mentioned it, and I think

it was yesterday, but, again, I know that there's some folks that are new to the AP, and so just a short recap.

The council held a series of twenty-eight, I believe it was, port meetings in the four states back in 2014, and that's when they were starting to gather input for their strategic plan for the snapper grouper fishery, and so that strategic plan became what we now call the vision blueprint for the snapper grouper fishery, and it includes goals and objectives and strategies and actions. Lots of input came from stakeholders during those port meetings, and many of the comments we heard from the recreational sector was that they wanted the council to work towards holding the recreational sector more accountable, and many of them suggested implementing a reporting requirement for the recreational sector.

Just some background on how we got here, and now let me tell you, in that options paper, as far as it was developed, there were a few actions, and so I will just walk you through those. Action 1 would establish a private recreational permit to fish for, harvest, or possess snapper grouper species in the South Atlantic, and, under that, we had options for should the permit be at the individual level, and so for the angler, or should it be designed as a permit that would be issued to the vessel, and what species would that permit potentially cover, and there were options there that would maybe include only red snapper, because that was a big topic at the time, and it still is, or all snapper grouper species, or maybe just the deepwater species.

There was also an option that would allow the council to request that a permit program or endorsement or license or what have you be developed by each of the states, and so that's one of the hurdles that is around this idea of developing a permit, is also who is going to administer the program and that sort of thing, and it gets really complicated, and so one of the options there was should the council just say, hey, states, we really, really need you to start developing these programs at the state level.

Another action was to possibly modify reporting requirements for recreational fishermen or vessels, and, currently, there is actually in place -- There isn't like an official reporting requirement for recreational anglers, but Amendment 15A, I believe it was, in 2008, which was approved by the council and the Secretary of Commerce, had a requirement that never became effective, and that was because it was -- It had something to do with the Paperwork Reduction Act, and there were some issues there, and so, even though the action was sort of approved on paper, it has never really been implemented, and that basically just says that, if you are selected by the Science and Research Director, which is what "SRD" stands for, then you would be requested to report your catch, and then it goes on to have a lot of specifics about what to report and then the frequency and all that stuff.

Given that that is kind of there, but it never became a thing, there is an option in this amendment to again allow for selection of a certain percentage of recreational anglers, or vessels, to report, and there is an option there to promote voluntary reporting, and then there is options for how often reporting should happen, and so the frequency of the potential requirement to report.

As I said, this options paper began to be put together in 2018, and this is when what became Regulatory Amendment 29, which implemented all the best fishing practices that we talked about this morning, the descending devices and changes to hook requirements and all that, and all that stuff was lumped together. That got split out, and then, in June of 2018, the committee reviewed



more of what I just told you about, specifically the reporting requirements for -- This is Amendment 46. Then they approved it for scoping, but we never got to that point, because the council got bogged down in other priorities, and development of this amendment was suspended.

As far as what you guys have commented and provided to the council, and I didn't dig back further than a couple of years ago, back to April of 2017, and I suspect there were discussions before that, but, in April of 2017, you approved a motion to recommend options for percentages of recreational anglers that should be selected to electronically report their catch each year. The following April, you also approved a motion to recommend that the council address accountability in the recreational sector, by requiring a stamp or a permit, and then, most recently, in October of last year, you, again, approved a motion to strongly recommend that the council prioritize development of this particular amendment.

Again, we have some questions for the AP. Would you prefer a permit or an endorsement or mandatory reporting, or maybe both, and what would be a reasonable reporting frequency, and do you have any specific recommendations on a permit or reporting program? Perhaps you're familiar with something that you think might work for the snapper grouper fishery, any kinds of things like that, and so, at this point, I guess, Jimmy, we could pause here and have some more discussion, again, of this particular amendment, with the acknowledgment that you're going to get a whole lot more information once BeBe gives her presentation, and then that is specifically going to deal with MyFishCount and what's been done with that program, and so I will pause to get direction from you, Jimmy.

MR. HULL: Okay, Myra. Thanks. It looks like Amendment 46 is coming back to life, and the council is going to try to get something going here, and many of the past input from the AP is something that we probably need to talk about and make sure that's how this current AP feels. I know that it's the way this chairman feels, but I think we need to have some discussion from everybody else. This is so important, and it's just a shame that it hasn't happened.

With that, I'm sure that we'll want to make a recommendation, from the conversations I've had, that actions that have already been proposed here, the possible actions, are exactly what needs to happen, and so, anyway, David Moss, you're up.

MR. MOSS: Thank you, Jimmy. Yes, definitely I would prefer an endorsement, and probably mandatory reporting, and for a few reasons. Number one, and not the least of which being that I have spoken with quite a few science people about voluntary reporting, and there is like an inherent bias with that.

Typically, you're only going to report if you've had a good day, and there's very few people that will report if they've caught one jack crevalle or something like that, and, again, I'm speaking from a recreational point of view, and I know, even for myself -- Like I have the MyFishCount app, and I wish I could lie and tell you that I used it every single time I went out, and I don't, and I forget, and, three days later, I remember, but I don't remember exactly what it was that I caught, and so a reasonable reporting frequency would probably be every time that you go out, again, especially for recreational anglers.

The vast majority of recreational anglers, if they're lucky, they will go out twice a month, and that's if you're really lucky, on average, and, I mean, there's some guys that go out there all the time, and I get it, but, for the most part, that's not the case.

As far as specific recommendations on a reporting permit program, no, and I will give kudos to the State of Florida, who did expand their reef fish permit, or stamp, and I forget what it's called now, but to the entire statewide, and it used to be only on the Gulf, and now, in the State of Florida, if you're going to fish for bottom fish within state waters, you have to get -- I think they call it a Reef Fish Survey now, but at least they have some grasp of the user group of who is fishing for reef fish in state waters, and so kudos to them, and I think, as the federal council, we definitely need to get in lockstep with them and really jump onboard with that.

MR. HULL: Thank you, David. I agree. Jack, you're up.

MR. COX: Well, I'm glad we're getting back to this, because I think it's super important, and it was talked about for a long time, but, you know, a lot of people may not know how the commercial side works, and I don't know how this could work for the recreational side, or what they could take from it, but I will just kind of throw it out there, real quick.

You know, when we have a commercial limited-access permit, we are required to -- I think it's like every ten days that we have to submit our reports, but what makes it easy to submit our reports is we have a trip ticket that the dealer gives us, so we can sit down and look at exactly what we sold and check the boxes and put the weights in and submit the economic data that they also want as well, and so that makes it easy for us, because we do have something to go by, and we don't have to keep it in our brain.

Then the other thing is, in some form or fashion, when they go to register their vessel, they should have to get some kind of stamp to put on it, and we talked about that, like a duck stamp for hunting or something like that, but just to have an idea of what the universe looks like and who is participating. I mean, at a very general level, we should do that, but, if we could go in-depth and actually use that in conjunction with what we're already using with the phone apps and some of these things that we're already working on, then I think we would have something in place a lot faster, because we've been working on that stuff for a long time.

I would hate to try to recreate something. Let's just take what we have in place and try to make it better, and that's what I would do, but, you know, I would just say this last thing. As far as state or federal reporting, I think North Carolina could do a fantastic job of collecting the data and passing it along to the feds, if we did something like that. Thank you, Jimmy.

MR. HULL: James, you're up.

MR. PASKIEWICZ: Thanks, Jimmy. I'm just going to go down the list here, and I would definitely suggest that we have vessel permitting and mandatory reporting. Both items are very, very important, I believe, to accurately monitor what we're doing on the water. Reasonable reporting frequency, I mean, within ten days to two weeks of a trip, or even a week or ten days. Let's keep it to where you've got a little leeway there.

As far as specific recommendations on a permit reporting program, we all are sharing this natural resource. If you think that you're smart enough to get behind the wheel of a vessel and go thirty or forty miles in whatever sea condition the day has to offer, or whatever storm condition might be on the horizon, if you can do that, I am pretty sure that you can report your catch, and so, specifically, I don't think this is out of the realm of possibility for human beings, and that's it.

MR. HULL: Thank you, James. Bobby Freeman, are you there?

MR. FREEMAN: I hope so. It's good to see that this has come back up on the agenda, and I fully support that, if you don't have a permit and a mandatory reporting, there is no way you really know how many fish are out there and how many are being harvested, and we can -- If there are violators that are exceeding creel limits and all that, a few random checks at our location, there by the inlet or the Coast Guard station or something, and catch some of these violators, and word very quickly gets around.

The boat owners running these multi-hundreds-of-thousands-of-dollars rigs, with the electronic capabilities and that sort of thing, the fish don't have a chance anymore. They cannot hide, and they certainly aren't able to run from these multiple hooks and all that kind of stuff going down, and so it's past due for more control over what's going on. If we're to save the fishery, we certainly need to know what's being harvested out of what's out there. Thank you very much.

MR. HULL: Thank you, sir. Randy McKinley, you're up.

MR. MCKINLEY: I agree. I agree that there should be a vessel permit and mandatory reporting, and it should be done within ten days, like we have to do, and, again, I agree with him before that there has definitely got to be inlet sampling and enforcement, to make sure that people know they've got to do it. That's it.

MR. HULL: David Moss.

MR. MOSS: Thank you. Just to kind of piggyback on what was just said, and I think it was James who had said it, about the electronics. These guys can -- Well, all of us, and, if we can operate all the modern electronics that we have, and the vessels that we have, there's no reason that you can't report, and I'm sure that somebody way smarter than me is going to come up with some app that can be downloaded onto your boat's electronics that would just be another screen over or something. Every time you caught, you could start to report there, and then, of course, once you got into cell range or whatever, it would upload to the web or the cloud or whatever. If we push this through as a requirement, the council, I'm sure that somebody is going to come up with some something that will go onto the boat's electronics that are going to make things very user friendly.

MR. HULL: Yes, that's a good idea, on your plotter, and you could record your landings and your discards right there on that spot. Right on. Andrew Mahoney, you're up.

MR. MAHONEY: I just had a suggestion for validating of the reporting and that, maybe through an app, you could check in when you're on the way out, and then, if you're stopped or something, and you haven't checked in, then you may have an issue there, and that would possibly force people into showing their effort and then have a countdown by day of when they can report by, based upon that. That's all.

MR. HULL: Thank you. Tony Constant.

MR. CONSTANT: It looks like we're all kind of in agreement. To piggyback off of what we've said, the app seems to be -- All the states have some way, shape, or form of an app in place for something, and, if we could come up with an app for the recreational fishermen that would also have what you were just talking about on your plotter, you could literally just push up the app and say one grouper, a porgy, whatever you have. You could do it in real time, but then, when you get back, you would have ten days to log in and record, which I do agree with that. Ten days is more than enough time to report your trip.

Also, if you had a sticker, and I know the commercial guys, obviously, have a big sticker with a number, but, if there was just a simple sticker to put on a window of a recreational vessel, it might help law enforcement to catch their eye, to know that this guy here is in the snapper grouper reporting, and that's it.

MR. HULL: That was a really good idea there, and I hadn't heard that one.

MR. CONSTANT: It just came to me.

MR. HULL: That would identify them amongst the masses. Exactly.

MR. CONSTANT: I know, in South Carolina at least, we don't have the volume of boaters that you do in Florida, but, typically, DNR will sit near the entrance to the sounds. If they saw that sticker, they would know that you were in the program.

MR. HULL: Right on. Chris Militello.

MR. MILITELLO: First of all, I just got on -- I'm new to the AP here, and I've got to applaud you guys that you've been dealing with this for this long and nothing has happened, and it's just amazing, and you guys have got to be pulling your hair out. A lot of recommendations it looks like were made, and nothing has gone, but I will move on from that.

I am all for the permit and the endorsement, or even both of them, and the ten-day reporting period is good, or even a week, and, as far as to cut down on how we know -- Not everyone that buys a boat is going to fish, but isn't there a way that you can cross-reference a fishing license with a registration, and that may be a possibility, to get the number of boats that are actually fishing, legally, I guess you would do it, but that's just a thought on that. That's it.

MR. HULL: Thank you for that. There's lots of different ideas of how to try to identify the universe without an endorsement or a permit, but I think the permit or endorsement is the way they've got to go, and, from my viewpoint, they're trying to push it to the state level, which some of the states are doing it, but the federal government should be funding this and doing this, in my opinion. Richard Gomez.

MR. GOMEZ: Thank you, Jimmy. So, I mean, this is a little monkey-wrench/opportunity that I would like to mention, which would be what a great opportunity it would be to finally separate the charter boat industry from the recreational industry. For us in the Lower Keys, that's been a thorn

in our side, dating back to when we used to sell our bycatch, and now, for years, we haven't been able to. We have never agreed with being heaped into the recreational industry, and, to me, this would be a good opportunity to create our own sector.

MR. HULL: Right on, Richard. You must have missed the discussion we had prior to you getting back on, where all of that came up, but, yes, I can see your point. Andrew Fish, you're up.

MR. FISH: I agree pretty much with what everybody says here, as far as the endorsement and the frequency and all that. I just have to look at the pessimistic side, and I think a lot of the fishermen have been burned by the science, and to get the fishermen to actually wrap their head around being a part of the science and not doubting the direction and the data that they're going to give these people and the manner in which it is filed through and registered and all that, and that's the only thing that I question, but I like the way it's going. Thank you.

MR. HULL: Yes, sir. Thank you for that. Chris Kimrey, you're up.

MR. KIMREY: I mean, the gentleman before me made a really valid point. There is recreational and charter and commercial, and there's a lot of fishermen that are very leery of fisheries management and the science side, and so that was a great point. I have heard a lot of people, in the last few minutes, recommend this ten-day reporting, or seven-day reporting, on the recreational side, and I would be curious if anybody had any recommendations on how to enforce that, because the number of recreational fishermen is exponentially what it is for these limited-entry commercial permit holders, and so to think that you can enforce that I think is a stretch, at best. If anybody has any recommendations on how to enforce a ten-day reporting on the recreational side, I would love to hear that.

I would say, the best-case scenario, you have to tie it -- If you came up with a permit for the recreational side, grouper or snapper, a bottom fishing permit or whatever, and the idea with the sticker, to identify those fishermen, I think it's a great idea. It would give law enforcement a little bit of an edge on who they might want to check and not check, but, if you tied the reporting to that permit, it seems like a pretty easy way to enforce it.

Now, of course, we're renewing these permits annually, I would assume, and so an annual report is not very accurate or very real time, and so, if you had the permit, you might -- I don't know, but make it a six-month permit during the shallow-water grouper season, or you have to renew it online once a month, but you're going to have to do something that's going to force them to report. If you're going to do it, that's the way it's going to have to be done, because, otherwise, they're not going to go fishing, on paper.

If they get ten days to report those fish, and they get them home, and they get them on the table, and they cut those fish, and they get them in their freezer bags, or whatever they're going to do with them, that's the last time they're going to think about those fish, because, at that point, there's nothing tying them to those fish, outside of social media, and the federal government could hire 100,000 people to monitor social media, and they might catch a few of them, because they're going to post pictures, because that's what the world has come to, but, to try to enforce that ten-day reporting, I mean, that is a huge, huge problem, in my eyes, unless you tie it to a permit.

The only way to get them to report is if they are scared of fishing without that permit and so, I mean, I would love to hear some recommendations on means to make the reporting a little more accountable. What are you going to use to enforce it? It needs to be done, and I'm in total agreement with that, and have been for a long time, because we need to know what's left in our ocean, and we need to figure out the best way to manage it, and the most accurate we can get is going to help us do that, but, you know, who has an idea on how to enforce that? I would love to hear it. That's all.

MR. HULL: Thank you, and we already have that figured out on the commercial side, and they would just have to apply it recreationally, if we ever did get lucky enough to get a permit or an endorsement. You would be required to -- Maybe it's just, with the recreational numbers, maybe it's just a percentage of people that are required too, and that's just another angle of it, but it would be tied to the renewal of that permit, and, if you didn't report -- On the commercial side, if we don't report, we cannot renew our permits, and we have to get caught up on them, and, every month, if you didn't report during that month, it's noted, and, if you don't fish that month, you even have to report no fishing, and so they have figured it out.

MR. KIMREY: I understand that, but recreational guys do not have a trip ticket behind them forcing them to fill out their logbooks, and that's my point, and so, if a grouper snapper boat goes out on an overnight trip, and he comes back and goes to the fish house, and he offloads, there's a trip ticket, and it's broke down, and I think that's awesome, because that's a really accurate account of what was taken out of the ocean during that thirty-six-hour period.

The recreational guy, he's not going to have that trip ticket pushing him to fill out that logbook. Once those fish -- They are not going to the fish house and getting counted with a trip ticket, and they're going to his dock, and they're getting put in freezer bags, and there's nothing to push him to report, and so, once he gets to that point, he's not going to feel like he has to report.

It's, well, I made it back, and the fish are gone, and it never happened, and so, if he's asked, he may -- You know, if he's like us, and he wants to do the right thing, he may report, but I can promise you that there's a large percentage that, if they're not forced to report, and there's not a consequence for it, they will not report, and it's going to happen. If you can get twenty guys to report accurate, it's better than not having twenty guys, but I would love to see how they're going to try to enforce this short-term reporting on the recreational side. That is a huge problem, and who has got an answer?

MR. HULL: All right. That's a good point. James Paskiewicz, you're up.

MR. PASKIEWICZ: I think those are some really excellent points, and, I mean, maybe as a launching point for this next phase, maybe a strictly voluntary reporting system, and you get the ones that are conscious about what's going on, and we're sitting here assuming the worst, and maybe we should start assuming the best in people and really putting it out there as a voluntary situation and say, hey, getting the permit is mandatory, and the idea behind this is we would really like you to report each and every trip, and get some volunteers together, and maybe not threaten as many people right off the jump and leave them with a bad taste in their mouth before they ever went fishing.

That might help eliminate some of the feeling of being burned by the system and really get us to a point where we can kick off on a positive note, rather than saying you have to do this or else, because there really is nowhere else, and we don't really hold the cards for that, and so, you know, I mean, maybe there is a way we can launch this to where we don't sound like we're trying to hurt anybody or keep anybody from fishing. I mean, I think perception plays a large role here.

I know, as a commercial fisherman, I have to enter these meetings and this entire debate process with an open mind, and I kind of have to suspend disbelief that science has been the problem all along. I mean, I have to sit here with an open mind and take it all in, and that's my charge, and that's why I'm here, and so I think that, if we don't threaten people, and we get it going the right way to start, we might have a chance. Thank you.

MR. HULL: Jack Cox.

MR. COX: That's a tough one. Listening to all of this, I think -- You know, this is a federally-managed fishery, and so I'm thinking they would probably have to get a federal permit, like a dolphin wahoo permit, and then we would at least have a universe of how many people are doing it, and then you would have to take a percentage of that user group and make them fill out the logbooks, like we do, and, if they don't fill them out and turn them in, like the commercial guys do, then, next year, you don't get to do the deal. That's how it works for us, and, I mean, we have to -- Even if we don't fish, we have to report it, but there is accountability, because they can always go back to our trip tickets and tell whether we're telling the truth or not, but this is the hard part, but something like that, and, I mean, somebody will have a better answer than I do, but that's a start.

MR. HULL: Thank you, Jack. David Moss.

MR. MOSS: Thank you, Jimmy. I think, as far as reporting frequency, I think it has to be every time you go, again, and somebody has alluded to this a couple of times, and, once you get home and you fillet your fish and they get in your freezer, or you cook them that night or whatever, best intentions, but chances are that's never going to get reported. Again, recreational fishermen, by and large -- You know, we go out there a couple of times a month, if we're lucky, and it's not all that much to ask, and, as far as enforcement, this is always a difficult thing, especially when it comes to recreational fishermen.

There is so many of us out there, as somebody has already said, and I think there's like ten-times as many recreational fishermen throughout the South Atlantic or something, and my math is probably off, but close enough, and so enforcement is always going to be an issue, and, if there was some kind of -- As much as I hate to say it, but even a quick hail-out, and like you push a button, just to let somebody -- On an app or something, just to let somebody know that, hey, you're fishing. That way, if they wanted to see if you reported or something like that, they could. I mean, that's something we could certainly tackle down the road, and I think the first step is to really push this to the council, the permit and then reporting, and then we can parse out how we're going to enforce it and stuff like that later.

MR. HULL: Thank you. Harry Morales, you're up.

MR. MORALES: In Hilton Head, we've got a guy, Marc Pincus, and he runs a couple of tournaments, and so, in the spring, we have a wahoo shootout, and then, this fall, we had a kingfish tournament. For us, one, you have to declare the day before you're going out, and, two, we have to take a photo of our chart plotter with the date on it and send it to them. I'm in agreement with the permit endorsement for this kind of fishing and then followed -- If we have to submit something, if nothing else, you have a log of all of the guys that were going out for bottom fishing.

Now, you get stopped, and you talk about enforcement, and you get stopped. Well, if you're using a smartphone, you've got a picture of that chart plotter and/or it's already recorded that you were going out, and so, if you have snapper grouper onboard, and you don't have previously-reported, well, there you go. You have the ability to enforce it.

If that were to occur on a periodic basis, I think you would end up with recreational fishermen following suit, because they don't want to get nailed, and I think this is the kind of serious discussion that we've got to push to the council, because, at the end of the day, I think the recreational fisherman has to be a part of the solution and not part of the problem. The other piece that I want to mention is that I'm in full agreement that the charter captains really should be yanked out of the recreational category. I mean, they're not recreational. Thank you.

MR. HULL: Right on. Bob Lorenz, you're up.

MR. LORENZ: I would like to just summarize a few things on the how would this be implemented, and I have seen it as fairly simple, and so I will give my five items from what I will call the greatest hits list of what's been discussed in previous years and a really great statement that we made today.

One is with the start of a permit, and it could be a vessel permit, and thoughts that I have had is, the first time you apply for the permit, the initial permitting, the first year, year-one, would be a more expensive year, and pick fifty-bucks as a price, if you want to think about, and there are some hang-ups with that, and you will be instantly told, by some members on the council that are within the government that that's going to be a very difficult thing to do, because they cannot charge more than what the cost of the permit program is, and so it may be a very low price.

I wanted to put a little bit of an economic incentive in there, and so you have to put some skin in the game to begin with, and it would be a slightly higher cost. They will immediately argue that that may not be able to be done, and fine.

The next thing would be that it would be annually renewed, and that would be at a lower cost, and so say five-bucks. Upon annual renewal, your permit would not be renewed for that lower cost, and thus the financial incentive, if you didn't report at all in the year before, and you would have to go back to paying the initiation fee to get a permit.

There could be an option, and I think the commercial does this, that you could state that you didn't fish, that you didn't fish in the federal waters that year, and that would be considered a report. It would be an annual report, but you would report, and you would state a reason. There could be penalties if you could even be proven that you lied, like I stated that I had medical reasons of why I couldn't go out, and there was no such thing, and people documented me out there.



We have talked about then, when you have that permit, and you have your number, that you sign in upon leaving the dock. As you leave, with cellphones and all today, which everybody has at the port, you simply report in and log-in, and you probably have a number associated with you, that you are leaving the dock to fish federal waters, and so you've signed in. That causes then -- That could go into a computer bank, which you will have to essentially report that you're back, and so, in ten days or a week, whatever you would want, you would have to either say, all right, I went out and I didn't catch any fish or you would give your report.

Then that would make whole the commitment that you made that you were actually leaving port to fish, and then the final thing, and I thought -- If you want to talk to enforcement, and you notice you have enforcement there, and, if you're caught out on the water without having signed in before leaving port that you were going to do such, and fishing federal waters for federal species that come under the permit, you could be hit with enforcement, but a great idea today was that stamp on the boat, or on the windshield, so that statement enforcement, for those that have a joint enforcement agreement -- I don't know how that would sit in North Carolina, because I'm not -- I can't say 100 percent, but I don't think, at this point -- We don't have a joint enforcement agreement of any kind yet, and so it's been a little complex with a state like us, and it's been an issue for years, but I'm not sure on that, and I haven't been talking to as many people as I normally had.

That stamp on the boat, like you said, it just lights up the fact, if you have somebody doing reporting at the port, MRIP or whatever, it flags that there is a vessel that fishes in federal waters, and I'm going to check up on them, and they can check whether you signed in to go and then also what your reporting history has been, a couple of simple steps. Thank you.

MR. HULL: They sound simple, but I don't think we're ever going to have a hail-in and hail-out requirement for private recreational anglers, and I don't know. Andrew Mahoney, you're up.

MR. MAHONEY: I just wanted to say that you probably are going to have to force people to report and not just leave it up to them to get them to do it, and, like I was saying, prior to somebody asking how to enforce reporting, an app would handle all of that, where you have to check in when you leave, just like everybody else said afterwards. That's all.

MR. HULL: Richard Gomez.

MR. GOMEZ: Listening to this conversation, this thought came into my mind, and maybe somebody could poke a bunch of holes in it for me, but it seems to hold a little water at the moment. Thinking about incentives and trying not to put too much pressure on individual recreational fishermen, one thing you could do is, whether they're leaving from their home or from a marina - - If they came back to -- You know, we're going to be creating monies with the permits, and so what if we were able to offer them -- If they brought their fish into marinas, especially marinas with a restaurant, because the restaurants would love to see that kind of business, but, if they brought their fish to the marina, to do their reporting right there, and maybe give them some sort of discount at the marina, and maybe the marina would meet us halfway, and maybe 10 percent off of gas or groceries or a free drink or two at the bar restaurant, something like that, because that would make people say, hey, you know what, let's go get our discount, and that's just a thought. Poke some holes in it.

MR. HULL: Thank you. David Moss.

MR. MOSS: Ritchie, just to respond to you, it's not about the -- Somebody can correct me if I'm wrong, but I think they're only allowed to charge the price of administration of the permit, and I don't think like they're allowed to make it economically -- I don't know what the word I'm looking for is, but I think they're only allowed to charge what it costs to basically administer the permit, from an admin perspective, I believe, but somebody can correct me.

MS. BROUWER: I think you're correct, David.

MR. HULL: Okay, guys and girls. We have really worked this over. I'm going to hand it back to you, Myra.

MS. BROUWER: Okay. Thank you, Jimmy. I think I would like to just get through this last little bit of this presentation, and then we'll get BeBe rolling with her update on MyFishCount. This is just an update for the AP on what's been happening with the amendments to Magnuson that are a part of this Modernizing Recreational Fisheries Management Act of 2018.

There is a workgroup that is a joint effort by the South Atlantic and Gulf Councils that is tasked, has been tasked, to address recreational management flexibility as it's been identified in this Modernizing Fish Act of 2018, and I'm just going to refer to it as the MFA. This happened in 2018, and it granted regional councils the authority to use certain types of management strategies, like extraction rates and fishing mortality targets and harvest control rules and traditional or cultural practices of native communities to manage recreational fisheries.

They are trying to get management agencies to use more flexible and adaptable management tools, and this is all supported by NOAA, and so this workgroup, which is currently -- Steve Poland, who is our council Vice Chair, and he's the representative from North Carolina, is the chair for this workgroup, and they have met just twice this year, and mainly to develop a charge, and that is to explore, as I said, these alternative management approaches to meet the needs of the South Atlantic region, and this includes data collection improvements and any other approaches that they can come up with to improve fishing opportunities in our region.

So far, they have some draft goals that they have put together, and they're up on your screen, to increase accessibility for recreational fishermen in the red snapper fishery, and they are looking at promoting more stability in management on an annual basis, to avoid in-season closures, when possible, and to look for ways to account for uncertainty in the MRIP recreational estimates, more flexibility in management approaches that might be implemented in our region, improving data collection on harvest and on discards, and, also, managing public expectations and striving for high levels of public buy-in.

This is, as I said, just a very quick update, to let you know what's going on with that, and, just for grins, we threw this in there, to see if the AP was willing to share any experiences that you may have with any alternative approaches in any other fisheries that you're familiar with that would still keep the fishery within its catch limits, and so that's a really tall order, but we figured we would just put it out there, and you guys have lots of really good ideas, and so, Mr. Chair, if you want to take just a few minutes to talk about this, and then maybe we can move on to BeBe's presentation.

MR. HULL: Yes, ma'am. All right, guys. Do we have some ideas or experiences to share that could possibly help keep the recreational sector within their catch limits, some type of flexibility, some type of alternative approaches to management, other than what we've discussed of all the other things that need to happen, but, just under the status quo of the way things are, is there some other alternative approaches that managers could take that you can think of that would work? I mean, we have these ACLs and catch limits that we have to stay within. Andrew Fish, you're up.

MR. FISH: I was thinking of red snapper when you said that, but I see a lot of these recreational anglers and charter boats, and they all come in on the days that they're open, and they all have fifteen to twenty-pound fish, and part of me wants to think that they caught those fish and then they quit fishing for them, but the other part of me thinks that they caught five-pounders and eight-pounders and ten-pounders, and they kept catching all these fish, until they caught the big ones, or, in an even worse case, that they caught all those fish and kept the smaller ones and then caught the bigger ones and then let them go. I was wondering what everybody thought about slot limits for those fish, to keep people from fishing and to keep people from possibly throwing back or sitting there and going through fish and experiencing some form of mortality when -- Just at the expense of catching them because they're out there. That's all.

MR. HULL: Thank you. That's a management approach that works in other fisheries, and there are a lot of inshore fisheries with slots. You know, you can certainly protect the larger fish with that, and the younger ones, and so that's something that could help, as far as with discard mortality, which definitely is a big issue. Dick Brame, you're up.

MR. BRAME: Well, again, we go back to the same problem that I talked about before, and you need something that informs you annually about what's going on with the fishery, because the recreational fishermen, the millions of recreational fishermen, are sampling this resource every day, and they are sampling what's going on on the water in real time, yet you're trying to hold them to a catch limit that's a projection that may be two or three or four years old.

We have got a model, at both the ASMFC and the Mid-Atlantic Council, where they do annual specification setting, and they do stock assessments every year for every -- Or at least every other year for bluefish and black sea bass, and I can't remember, but there's three or four species that they do stock assessments every year, to determine what the population is, and then they set the specifications. Again, where you run into problems is when you have an unexpected increase in the population of fish, and the fishermen are catching them, and you don't have anything to inform you that that's going on, and so it really is managing the fishery like we manage striped bass or bluefish.

You would take, I would say, just off the top of my head, if I remember a graph, or a table, that John Carmichael made, and you would take about a dozen of the snapper grouper species, and that comprises 90 percent of the catch, and you don't have to do it to all seventy-some species, but do it to the important ones. That's my suggestion.

MR. HULL: Thank you, Dick. Rusty Hudson.

MR. HUDSON: I was just saying that I was just going to basically step back from it, because alternative approaches, when you're doing an estimate of so many people, and you just don't have a sense of -- There's got to be a better way.

MR. HULL: Thank you, Rusty. Looking at some of these bullet points, the draft goals, a greater accessibility for recreational fishermen in the red snapper fishery, and stability in management annually, avoidance of in-season closures, and there's a lot to tackle, and, if you took them a little bit at a time, one fishery at a time, the red snapper fishery, which is really important and popular, and accessibility is necessary, because, right now, you're looking at two and three days a year, and somehow to get a better account of what is being caught, and maybe reporting, if you could --

They could have a lottery for people that report, that you could win something, like a brand-new Contender with quads on it, something like that, that people are going to say, okay, if I report, I may win something, or some type of reward for reporting, without having permits and endorsements at this time, using what we have so far. There has just got to be a better way, because what we're doing is not working, and we can all agree with that, and the MRIP uncertainty is totally unacceptable, and that system is not working either, and so, Myra, it's back to you.

MS. BROUWER: Thank you, Jimmy. Okay. If you're okay with moving on to the MyFishCount update, Jimmy, and I don't know if you would like to take a short break or just keep on moving along.

MR. HULL: You know me, Myra. Let's keep on moving along.

MS. BROUWER: Okay, and so BeBe, if you're on, and you would like to take control of the screen, go right ahead.

MS. HARRISON: All right. Thanks, everybody. Thank you to the Snapper Grouper Advisory Panel and Myra for having me present today, and Brian Chevront and I are going to give you a final review of the MyFishCount pilot project, and, just before I start, because I've been making notes as we've been going along, and so bear with me, and there's like 400 blowers outside, and so my apologies, but I just wanted to say thank you to the folks that have been working on the MyFishCount team with me since I've been here, which is Myra Brouwer and Brian Chevront and Chip Collier and Mike Errigo. Then I also wanted to say thanks to the outreach team, who has been very supportive as well, and letting me run things by them, and that's Cameron Rhodes, Kim Iverson, Julia Byrd, and Allie Iberle. I just wanted to get that in there before I started. Thanks again for having me.

As you all have heard, in 2017, the MyFishCount pilot project began with the Angler Action Foundation with funding from NMFS, and so National Marine Fisheries Service, and the app and web design by Elemental Methods.

The project began gathering information from the red snapper mini-season and expanded in lots of ways. The project was a true pilot, and it was gathering data from users and adapting the app and web portal as we learned from the people that were actually using it. MyFishCount is now fully usable year-round for all species found in the South Atlantic states of Florida, Georgia, North Carolina, and South Carolina, and not just coastal counties, and so it's all across the state, year-round.

One of the things that I think was so important is to have the entries of those people catching red snapper outside of the season, and I think, for recreational anglers, that's a very important piece of information, but having it year-round for all species encourages recreational anglers who fish in different areas, inshore and offshore and freshwater, to log all their trips, all the time, and keep them in one location, and so there's a lot of things that have been brought up that we've tried to address over this pilot stage.

Input from anglers drove lots of these improvements. One of the things that I think some of you may have mentioned was the quick log, where, if you're out and you're catching thirty-two red snapper, you can quick-log them ten at a time, and so that is going to be super helpful to keep track of that, if you're going to do that while you're on the water.

The outreach for this project, really that's what I was doing, was more of the recruitment and retention of app users, and it was pretty in-depth, and it was much more than this graphic can really depict, and so, each year following the red snapper mini-season, there's a report that's provided to participants in MyFishCount first, so that they can see what's going on, and then it's shared with the public after that, and so they get a little heads-up on what's reported through MyFishCount after the red snapper mini-season.

The report shows the MyFishCount users that what they are reporting is actually being seen and making a difference and that fishery managers are listening and can see that information, and so other outreach included several updates to the MyFishCount website, the addition of a Facebook and an Instagram page, a monthly newsletter, including an incentive, and so I've heard a lot of incentive talk, and I like you people. I appreciate it. That incentive is meant to share the app with friends and not to reward people specifically for logging specific trips, and we'll talk about that in a second.

Then updated training videos, working with state partners, working with several industry partners, numerous in-person outreach events, and that was prior to the pandemic, and those in-person events included fishing seminars, fishing club presentations, marketing presentations to state agencies or state entities, conferences, in-store visits, and even more than that.

The social media portion of the outreach, it really helped MyFishCount reach an additional audience that we had not reached before and gain some support there. There were definitely pros and cons to that social media approach, but some of the cons, I think, can be viewed as a pro for the future. For example, fairly recently, we have reached a lot of anglers beyond the South Atlantic, and so we went outside of our range, and I think that could potentially be a pro down the road. Working with industry partners and influences allows MyFishCount to gain some momentum and really develop a following to help encourage others to download it and to start using it and logging their trips.

When you're looking at this correlation, or these graphs, you can see the correlation between some of those major events, including the in-person events, and the number of downloads and trips logged, and so you can definitely see that there's a strong presence of downloads and trips logged during the red snapper mini-seasons, and that's also the time that ICAST occurs, and so you can also see a sharp increase in some of the in-person events, like the Sportfishing Summit that ASA puts on, and then there was a Saltwater Seminar Series that George Poveromo invited us to attend,

and we set up a booth there, and I will tell you a little bit more about that in a second, but I definitely hope that you can see some of those correlations with the in-person events there.

Our efforts to engage app users included -- Like I was mentioning earlier, we accepted a lot of feedback and suggestions for improvements, and we've made a lot of those improvements. Directly contacting app users, time prohibited a lot of that, but it was very valuable to actually do that, and having app users and their friends follow us on social media and participating in our incentives, and then also contacting lapsed anglers, or lapsed app users, to reengage and using survey tools with the app users.

One way that we engaged the app users was by a newsletter, and so each newsletter had four main parts, in most issues, and there were a few that were a little different, like the one following the red snapper mini-season and, most recently, one announcing our transition, but most of them had four main parts. That was an opening message from us, from the MyFishCount team, an incentive that we provided from an industry sponsor, or industry partner, a best fishing practice, and Cameron and Chip helped a lot with that, and that was used as a way to encourage responsible angling for the app users, and then we highlighted an app user, to create a little more buy-in from folks.

Every single angler who I contacted about being that highlight, that angler highlight, in the newsletter not only gave me permission to use their name and their photo, but they all gave me a detailed description of why they used the app or why they thought it was important to use the app, and so that was very beneficial, and it was great for peer pressure, just to have others see that their peers were using the app.

On the incentive front, we knew that we could not reward folks for entering multiple species or a certain number of times, because that could skew the data, but we decided to offer incentives to folks for spreading the word or sharing information about MyFishCount, that it's a tool, that you can use it, and it was valuable and free, and that everybody should be using it that's a recreational angler.

As we were getting our feet wet with the incentives and building up to some bigger brands, we saw some growth due to those incentives, but, with that combination of some major brands coming up and the pandemic shutting down the in-person outreach, we actually did see a surge in reach and engagement over the summer months, and it shows that June, July, and August really received the highest engagement.

For June, that highlight, or incentive, was showing that -- The beginning of June is National Fishing and Boating Week, and Plano sponsored us at that point, and, really, Plano kind of kicked us off into really a good number and a good reach and a good exposure, and we have some wonderful brands, as you saw on the previous screen, like Engel Coolers and Gillz Performance Wear, and we've had some great people join us.

In July, we let everyone be a winner, and I think Cameron mentioned and showed some of our swag that we had, and one of the things we did for July was you could enter -- Everybody that downloaded the app and shared this information and sent us their mailing address received a bag, and so we did send out quite a few of those. Then, in August, it showed our most growth in our following, in our Instagram following, when we offered a \$100 gift card from Huk.

As I mentioned earlier about the in-person events, they were -- They seemed to be really successful in recruiting new downloads, in hopes of creating more app users to log the trips, and so George Poveromo's Saltwater Seminar Series was really an incredible place to recruit, because all of his shows consisted of specifically our target audience, recreational anglers, and really not any other extraneous attendees. If you were at the event, you fished, or you at least wanted to. Everybody there was a fisherman, and he generally sold those shows out, 500 seats, and you were there to learn and talk fishing.

He was very supportive, at those shows, and encouraging, and he would send the folks outside and say go to MyFishCount and learn what she's doing and talk to her, and he even made a commercial for us to use at our ICAST virtual event this year, and I'm going to see if I can play it. *(Plays video)*

Beginning on December 1, the MyFishCount project is going to be handed over to Brett Fitzgerald with the Angler Action Foundation, and they will serve as the lead organization. To the app user, MyFishCount should appear to have minimal changes. There will be a slight logo modification and some changes in contacts, but the experience using the app should really remain the same. Most of the transition will occur behind the scenes, and we've been working on this for a while, and app users shouldn't experience a disruption in service, and so, at the end of the year, the grant cycle from National Marine Fisheries Service will end, and we're actually going to make the transition so this will begin under the direction of the Angler Action Foundation on December 1.

Like I said, the transition has been ongoing this fall, and it will be officially complete as of December 1, and I will remain the council contact until December 31, at which time that funding will end, and so, after that, Myra Brouwer and Cameron Rhodes will serve as the council contacts for Brett at the Angler Action Foundation.

The next steps are data are still being collected through the end of the year, and all components of the project are being transferred to the Angler Action Foundation, and the council will continue to encourage methods to improve available data, recruit more anglers to download and use MyFishCount, and share on social media. That is what I have on the final report so far for the outreach component, and I'm going to turn it over now to Brian to continue with information and findings from our survey. Myra, did you want me to stop and ask for questions here?

MS. BROUWER: BeBe, I think -- It's up to Jimmy, but I was thinking that maybe we could let Brian and you finish the presentation and then have discussion after that, if that's okay with you, Jimmy.

MR. HULL: Yes, I agree.

MS. HARRISON: All right.

DR. CHEUVRONT: Okay. Thanks, BeBe, and, just so that everybody knows, just to follow on with the transition discussion that BeBe is talking about, I just really want to emphasize the fact that, if you're using MyFishCount, you're really not going to see any difference in the use of the app, as well as all the data is going to continue to be gathered and be able to be used to help with fisheries management, and we've already gotten some requests from MyFishCount data about whether -- You know, is there anything in there about such and such, and so fisheries managers

are learning about it, and it's seeming like it's starting to get some support from fisheries managers, just beyond what we're doing as our own internal work at the South Atlantic Council, and so it's pretty exciting.

We're really happy with what's going on with all this, and we're getting some really good data, but, to follow along, MyFishCount has been going on now -- As BeBe described, it started, early on, trying to collect some data as a demonstration pilot for some of the red snapper mini-seasons, and so, in starting, looking at the red snapper mini-seasons, there was a graduate student from the University of North Carolina who was looking at how people might want to use this app, and it was very focused on red snapper mini-seasons and all at that time, but, as BeBe described, it has really expanded and just grown hugely since that time, and I think BeBe was really quite modest when she was talking about major events and seeing the growth in the use of the app.

If you really dig into that data, you can look at see that, when BeBe did this, then you can suddenly see that a bunch more people started downloading the app and creating profiles, and so I don't want to minimize how important it is to have a champion out there for outreach to get people focused on using the app and somebody who can be a resource that's devoted to using this app, someplace that they know that they can turn to, and that's the role that BeBe has filled, and so she's been the champion for it, and she's been answering all the questions that people have, and she's been really wonderful at doing all that.

Anyway, getting back more to the survey, in 2018, the survey that was conducted by a graduate student at UNC Chapel Hill focused on the early development of the app and trying to figure out where things need to be and where it needs to go, and, well, in 2020, we're getting closer to the end now, and it's gone on for a few years, and we actually had two separate grants that funded this, and we've been working with the Angler Action Foundation, and so we wanted to find out some more things about what's going on with the app and the perceptions of how people are using the app, what they think about it, especially the new developments and things that are going on.

What was really important is that we wanted to focus on what drives an angler to download and report, because we thought that was going to be really an important feature, because one of the reasons why the council went down this road in the first place was in talking about how can we collect data from recreational anglers, especially if they do, at some point, require some kind of permitting or whatever. What are they going to do, and so we wanted to find out about the use of the app and what drives some anglers to consistently report.

Now, since the initial survey, the surveys -- There was a lot of snapper grouper questions in the very first survey, because it was related to the red snapper mini-seasons, and we have some snapper grouper questions in the 2020 survey, and so I'm going to be talking a little bit about some of those things, and I'm going to be presenting some of the results here shortly that seem to be probably mostly relevant to what this advisory panel is interested in and not give a more comprehensive overview of everything that we have learned, either through the survey or just through looking at some of the data, but the 2018 survey was more of a shotgun approach.

It was distributed to the South Atlantic Council's email list, but, in 2020, we targeted it down to just the app users and not people who had just downloaded the app, but the people who actually created a profile, and many of the people who were in the survey, because I think it was actually a two-stage survey in 2018, but there were people who actually were using the earlier versions of



MyFishCount, and they were also -- Because they were users, they were also users in 2020, and so there were some people who used the app in 2018 who were in the initial response group, and there was, I think, 122 in there, and there were -- In the 2020 survey, there were 260 respondents, who were just app users at that time.

The one thing that I still want to mention is that both surveys had some questions that were the same, because what we wanted -- Part of what we wanted to do was make sure that, if we wanted to, in the future -- Could we combine the results of the two surveys together, and, to be able to do that, we would have to be able to prove that the groups of people that were surveyed are substantially the same, and, if you have some of the same questions on both surveys, the range of the answers on the surveys between the two surveys -- The response ranges have to be the same on the same questions, and that gives you an indication, at least, that the people in both groups are substantially the same, and so we did have some of that that we did.

Just to show you one of the things that we just checked, to make sure that was similar, if you look at the graphic on the right-hand side, it shows the state. If you look in 2018, versus 2020, if you look at the four different states that are from the South Atlantic region here, you can see there is very little variation in the percentage of respondents of the two surveys from each of the different states, and probably the biggest difference is 16 percent from South Carolina versus 23 percent, but, if you look at all the others, it's not a very large difference among them, especially when you consider the number of surveys that we have completed between the two.

Some of the things that I wanted to look at that were similar is that, for example, the respondents in both of the surveys reported that they were more likely to report, that they believe others in their angling community -- They are more likely to report if they believe other people in their angling community are also reporting, and so the idea of peer pressure is one of those things. They will do it if they think other people are doing it, and both surveys matched on that.

It was interesting, and we went a little bit further in the 2020 survey, and, while both surveys found that participants thought that their participation would help fisheries management, in 2020, we asked the question a little bit further, and they thought that maybe that they thought that it would help fisheries management, they thought that other fishermen might doubt the effectiveness of electronic reporting, and so that's an interesting finding. They thought that they were believers, but they weren't sure that other fishermen were believers, and so that's interesting.

What I want to do is -- Now, the results that we're going to talk about here are just results from the 2020 survey, and this is the 260 participants that we surveyed this past spring, and it went into early summer. Hopefully some of you were in that group, and we sent it out to everybody who has a MyFishCount account, and, if you didn't respond, we sent follow-up emails, to try to get you to respond, and we were happy with the 260 respondents, and hopefully you were one of them, but remember now, by 2020, the app was not focusing just on red snapper, or even just snapper grouper.

It was -- Like BeBe said, it was all your fishing everywhere, and so one of the questions we did ask though was how many private trips, and so we're not talking about for-hire, and certainly not commercial trips, and so how many private trips did you take targeting snapper grouper species in the last year, and so, out of the people who responded to the survey, sixty-five of them said zero trips, and I thought, boy, you've got to kind of wonder why they're not going after snapper grouper

species, but, anyway, sixty-five of the 260 folks basically said that they didn't take any trips harvesting snapper grouper species last year.

It's very interesting. When you look at the range of numbers of trips that people took, the most common one was about one trip per month. Now, that's probably not a bad number. I mean, I would probably guess these app users are probably a little more avid fishermen than most, or they're boat owners, or they have access to that, to get out to do that, and I don't know, and I was thinking that that might be a little bit high for the average Joe on the street, but that's a good number of folks who are out there fishing for snapper grouper species.

One of the things we wanted to do then is to look at how important did they think snapper grouper species were compared to other species that they fish for, and the majority of folks said that they were among the most -- At least among the most important species that they target, or the most important, and those who said that among the least important, or not important, and probably of those who are neither important nor unimportant, and those are those sixty-five folks who said that they didn't fish for snapper grouper in the last year, and so, among our app users, snapper grouper is important to them.

Now, I want to explain a little bit here, and we've got a couple of slides that are going to look a little bit like this. We used a range scale here, and we presented the people who took the survey with a range of one to five, and you choose the number between one to five, with one being wasn't important at all to five being extremely important, and so, if you have a number of three, that's right about in the middle, and so that is sort of the not necessarily real important, or very important, and not unimportant.

Once you get above three, you're increasing the level of importance, and, below three, you're starting to head towards unimportance, in terms of what the average score was, and so, to get an average score, and this is across all of the respondents to the survey, and so, to get an average score of five, literally -- To get a score of five, every single person in the survey would have had to have said their answer to the question was extremely important, and that's highly unlikely to ever happen in a survey, especially when you have that many respondents.

I can tell you that, on every question where we have this type of score, we had the full range of scores, from one to five, for every single question, and so, the higher the score, or the lower the score, it tells you that that is -- People felt that way pretty strongly.

We asked people to tell us about some factors that affected their decision to create a MyFishCount account, and I arranged them from the most important to the least important, and so the most important thing is they wanted to participate in fisheries management, and that was the most important reason why they wanted to do it, but not far behind it was the belief that they thought that using the app would help their interests as an angler, and somewhat important is that they felt that MyFishCount is a more efficient way to keep track of the status of the fisheries than other electronic reporting systems, and we're going to come back to that specific thing towards the end here.

There was some curiosity about MyFishCount, but, interestingly, it was recommended to me by another angler wasn't so important to the average score, and it was to some people, but, to other

people, they either found it on their own, or they got it through an email, but it wasn't necessarily through another angler.

Then we asked them about some of their impressions of MyFishCount and what's important about the app or what it is that gets them to use the app, and what is it that makes this app important to them, and, again, it directly helps the fishery managers, but it also is an internalized feeling as well. It gives people the feeling that they're helping with conservation, but, as part of what you can do in the app, it also --

You can enter your location of where you're fishing, and people thought that it could help protect their fishing spots from ocean development, and so people know -- The data are confidential, and we don't release out to anybody who is fishing where or what, and we don't say this is a real hotspot, and go fish here for this. We don't do anything like that, but there's a possibility that this could be used to say these are the areas, in general, where people fish when it comes to ocean development issues, and so we will know, in general, where people are fishing, and we don't actually know, usually, the exact location where somebody is fishing.

Less important becomes some of the things like that MyFishCount provides incentives for me to use it, and that was something that was started later in the life of the app, and I'm sure there's a number of folks who enjoy it, and there are some people that maybe didn't participate in the incentive program, but that's okay. For some people that do enjoy it, it's important to them, and, for others, it's not.

The other thing is that MyFishCount helps me track my fishing progress, because one of the features that's in there is you don't just report what you catch and send it in and never see it again. You actually can keep track of your trips and see what you caught when and where and what you did, and it keeps track of the weather and all of those sorts of things, and so you can learn more about your fishing style or what works or what doesn't work based on where you are and things like that.

For some folks, that was less important, and another thing is that it stores photographs from my fishing trips. Some folks really liked that, and apparently some folks didn't, and it's just a difference in how people use it, but that's the thing about a really good app. A good app lets you use it for what's important for you, and so the fact that some of these scores are a little bit lower - I wouldn't say that they are features that aren't worthy, or aren't good, but it's just that they are features that are maybe not being used universally, but they could be very important to the people who are using them.

I had mentioned before that some people said that this app, compared to other electronic apps, the average score was that it was higher than that. As it turns out, we asked people what other fishing-related apps had they used, and this group had used -- A huge proportion of them had actually used at least one other fishing app before, and, if I recall, that number of those who had reported that they had never used a fishing app before MyFishCount was relatively low, and I think it was like 14 or 16 percent that said this was the first fishing app they had ever used.

What I did is I grabbed the top ones, and a few others that people might be interested in, and the most commonly-used other fish app that people said they had used was Fishbrain, and the next most common was Fish Rules, which is another app that is put out by the council, and hopefully

all of you have copies of that, and then there is Tide Alert, which is a NOAA app, and you can see that then the numbers start dropping down from there, but these folks who responded to the survey, and who are using MyFishCount, already are fairly comfortable with using apps in general, and I think that may have been my last slide. Yes, that's it. BeBe, I don't know if there was something else that you wanted to say.

MS. HARRISON: I did want to mention too that there was an incentive, and Brian did mention that the survey was sent to all the MyFishCount app users currently, and one of the things that I spent a lot of time doing, as you probably figured, was working with industry to build support for that, from that realm, and I had one of the industry members come to me and say, well, what do they get, and they were insistent that MyFishCount users needed to get something, and so, if you did the survey, you did receive an incentive of a complementary three-month subscription to *Saltwater Sportsmen Magazine*, and so that was one of those things that was like a positive reinforcement for spending the time to do that.

So many of these components take up so much time, and I know a lot of the concerns are still going to be out there, and I know that not everybody is going to use the app, and there's just going to be one of those things that -- This is going to continue to be a learning process, and this isn't all the answers, but hopefully this gives you a little light into knowing how much effort and energy was put into this pilot project, and I will be happy to answer any questions, and Brian will, I'm sure.

MR. HULL: Thank you very much, BeBe. Myra.

MS. BROUWER: Thank you, Jimmy, and thank you, BeBe and Brian, and I just wanted to take a minute to just say how grateful we are to BeBe. She has worked tirelessly since she started with the council on this project, and many of you have met her, and I feel terrible that, because of the pandemic, she hasn't had as much opportunity to meet with AP members, but BeBe is -- She has such great energy, and she loves to fish more than anything in the world, and so thank you, BeBe, so much.

MS. HARRISON: Thank you. It's been a pleasure.

MR. HULL: Yes, and thank you, BeBe. I can tell you that, when the AP first heard of this, there was a standing ovation, a few years back, and so it's great that this has grown to what it is. Other AP members, do you have comments or questions? It looks like Harry Morales. You're up.

MR. MORALES: I think that it's a tremendous, tremendous improvement, and, in fact, given what we were talking about earlier, BeBe, do you see this app incorporating the GPS components that are in smartphones?

MS. HARRISON: When you log -- If you log your trip where you are, you can drop your pin, and so it's automatically on there. Now, if you wait until you get home to log your trip, you can set that pin where you were fishing, and it's not as effective, in my opinion, but that's one of those give-and-take things. You're going to have to decide what is the most valuable bit of information that you want to get from a trip, whether you want to require anglers to log in place or log once they return, and so it is incorporated in there. Myra may know more about that, but, like I said,

depending on where you are, and you can actually choose if you want to drop a pin or if you want to use your current location when you're logging, and so it's definitely worked in.

MR. MORALES: All right. Thank you. The last time that I used it, I guess I didn't see where I could mark the spot, and I also have like the Navionics app, the boating app, and, because it's strictly driven by GPS, you don't have to worry about a cell signal, and that's why I was wondering.

MS. HARRISON: I've got you, and some -- I think, in some cases, you will have to -- It will update once you get back, and so, if you go out of cell range, that could be a problem. Navionics and -- You know, the Angler Action Foundation is really looking to continue partnering with folks, and Navionics is potentially one of them, and Garmin is potentially one of them, and so just keep watching the MyFishCount, even as it transitions out of the council.

MR. MORALES: Yes, because I'm out of the country right now, and that Navionics app is working where I'm at in the Caribbean.

MS. HARRISON: Excellent. If you haven't looked at MyFishCount in a while, I would suggest doing that, and I think it should work out of the country. If you go ahead and log in and want to run a test trip, you can run it in test mode, and it will not be counted with the trips, the actual trips, and so just run a test log, and answer whatever you would like, just to see and play with the features.

A lot of the times, I get input, or questions, from anglers saying I wish there was a way that I could log more than one fish at a time, and then you show them that you can do that, and you can log ten at a time, and so it's just a matter of how much you use it and how much you explore in it. Like I said, over the past three years, we have made tons of changes, and so, if you haven't logged in in a while and run a test trip, I suggest doing that and exploring all those features. Try to do things that would be outside of your range, just to play with the features and see.

The weather feature is amazing, and you can see moving radar, and you can see tides, and you can see moon phases, and I just recommend to everybody to go in, if they haven't logged in a while, and either log your last trip or just go in and log a test trip, so that you can see what it has to offer.

MR. MORALES: Well, hopefully I will be fishing Friday, weather permitting, and so I will give it a try, and I will let you know about it.

MR. HARRISON: I look forward to it. Thank you.

MR. HULL: James Paskiewicz.

MR. PASKIEWICZ: Thanks, Jimmy, and thank you so much, BeBe. I think that the work that's been done with this app has just been amazing, and I have been a panel member for a few years now, and I did see this program in its relative infancy, and I'm really happy to see the strides being made, and I have to wonder, as we discuss how to further manage the accountability of the recreational sector --

I really feel like we could use this tool, if we did have a firm number of permits issued to vessels and we're going to fish in federal waters for the snapper grouper species, that we could really get

some numbers based on this app. I mean, if we had a number of how many people had licenses to fish and how many trips were being made per year, you could cross that against the data in this app and really start to paint a picture, without a mandatory trip reporting system in place, and so I feel like there's a lot of good being done here, and I hope that we can continue to use this in the council and really go from there. Thank you again.

MS. HARRISON: Thank you.

MR. HULL: Great comments, James. Tony Constant, you're up.

MR. CONSTANT: Hi, BeBe. By the way, great job. I have been to a few of the meetings when this was in the infancy, when it was just being talked about years ago, and, boy, it sure has come a long way. Piggybacking off of what he just said, do you think it's possible to put a spot in MyFishCount that you could enter your permit number and account for your catch?

MS. HARRISON: The short answer is yes. Vessel number is on there, and we could adapt this in a number of ways, and so, if there was a permit requirement, sure, we could put that in there. I mean, this is -- Like I said, this has been a pilot, and, if there are changes that need to be made after the end of the year, you will be talking to Angler Action to do this, if this is one that you want to see continue, but that kind of information is easily added.

We tried to be very specific in the things that we were requesting, because we know that time is money, and folks need to -- A lot of people have the best intentions and want to enter as much information, and I tell people really -- Just to get the sheer number of users up, I tell people that you can enter as much or as little information as you would like. Let's get people voluntarily using it, so that we can build this, and we can actually have data to pull, and so, yes, to add a field like that, so that you can cross-reference, shouldn't be a problem.

MR. CONSTANT: I remember, early on, it was mentioned about reporting to each state through this and adapting to each state's software, and you all never said no, and it was always, sure, it could be done, and then it just happened to dawn on me that, if we did something with the snapper grouper, just accountability on recreational, just have them enter it here. That might work.

MS. HARRISON: That might work.

MR. CONSTANT: Thanks.

MR. HULL: Chip.

DR. COLLIER: Thank you, Jimmy. I just wanted to point out that, if you go under Profile in MyFishCount, you can actually add a federal license in there for your recreational fishery, for your for-hire. If you want to put your state licenses in there, you can do that as well. All of those are possible within the app right now, and it just doesn't mean much if you put them in there. It was created with that idea in mind. If permitting was going to be required, we wanted to have it to be able to be incorporated pretty easily.

MS. HARRISON: Perfect. Thanks, Chip.

MR. HULL: Bob Lorenz.

MR. LORENZ: I just wanted to add, just a source of information, and I don't know whether there will be follow-through or not, but, when we were speaking earlier about recreational management topics and things, I brought up that the National Academy of Science has been contracted, and, as I'm sitting here, without reviewing my notes, I don't remember who it was, whether it was NOAA Fisheries, and I brought up MyFishCount to that group.

It was composed of fisheries managers that were on our coast, Gulf, the Atlantic States, but there also were some folks, including professors and things in fisheries, from the Midwest, and the whole idea was to improve MRIP, and, I mean, that is the project they are tasked with, and it was contracted at the National Academy of Science. I brought up MyFishCount, and I entered an idea that -- I challenged them to consider an index for reporting, if you look at our recreational anglers, and one would consist of MRIP, and I call that the audit function, and, I mean, somebody will show up and check what you're catching on a random basis, and I told them a second that's readily available is MyFishCount, and that's voluntary reporting, but, as mentioned by folks like David Moss, sometimes that's your most enthusiastic anglers, and maybe better anglers, and then the third component would be someday if we had a recreational permit or something with mandatory reporting.

I presented it as three legs on a stool for better recreational reporting, and I told them about this, that I feel that this is one they could start working in right now, and, maybe between MRIP and this, and even if they just blended these two by some type of scientific means, we would have a better way to report what recreational anglers are currently doing, and so I need to call them back and ask if they -- I have had no follow-up since then, other than speaking to them on where this goes, but I just wanted to let you know that this tool has been passed on and brought up to others to look at to blend in somehow and come up with a better recording system of recreational catch and to use what's already there, and the first step would be in lieu of the fact that we do not have mandatory reporting, and I just wanted to pass that on.

MS. HARRISON: Well, I appreciate that, and I'm going to go a little rogue here for a second, and so bear with me. I appreciate folks passing that along, and I think the key component, or one of the key components, of MyFishCount is that Angler Action came to the council and said help us make this work for you, and help us understand what to ask for from anglers, so that we get the right scientific information from them.

There are a lot of fishing apps that already exist, and you saw some of those mentioned in the survey work, and a lot of those fish apps are racing to retrofit their app to allow for data extraction, which I don't know how that's going to fly, but I do know that it's happening, and I know that big one is happening, and it's got some interest from universities, and so the fact that MyFishCount was developed with fishery managers from the get-go gives it a lot of teeth, I think, and so I appreciate folks doing that and spreading the word for us.

MR. HULL: That was very good, and I would have a question, BeBe. Along the lines of what Bob said, you've got a couple of years of data, and what's the -- What's your thoughts on the data that is being collected, and how is it going to be used? What do you think? I mean, you don't see this brought up in SEDAR stock assessments as some new data yet, but do you see that in the future?

MS. HARRISON: I am going to throw that to Chip, who has been looking at that a lot more in-depth. I am not your statistics person, by any stretch of the imagination. If you want me to get a partner to push this, I will be happy to do it, but, if Chip doesn't mind fielding that, or Myra, I would greatly appreciate that.

DR. COLLIER: I would be happy to field it. Thank you for the question, Jimmy, and we have been supplying data to some of the SEDARs, and so we are going to be supplying the length data that we have for released fish, of red snapper, to SEDAR 73, which is the South Atlantic red snapper stock assessment coming up in December. Mike Errigo is working on that dataset right now, and we should have a final paper prepared by the 16<sup>th</sup> of this month.

Then we've also been looking at it for other species, to be considered for management, maybe of some length of fish that are released, but we also have information on how fish are treated in release, and so that can be used to inform the discard mortality estimates for a variety of species. We get information on the depth that people are fishing, and that can be used in some of the discard estimates as well.

What we're not trying to do right now is actually estimate the total catch, just because we don't know how to expand what is being reported through MyFishCount to the total population that's being caught, and so we do want to put that caveat out there, that what we're trying to do is just describe different parts that might not be available through the historical data collection programs.

MR. HULL: Thank you. That sounds really good. Brian.

DR. CHEUVRONT: Just one other thing that I wanted to add with what Chip was saying is that, from the beginning, the data that are being collected from MyFishCount are compatible with the ACCSP, and I'm not sure if you all understand that, if there's any data folks and stuff out there, but, basically, the bottom line is that the data that are being collected are data that are compatible with all the other data on fisheries and fisheries management that are being warehoused in one central location, so that the MyFishCount data fit the same protocols for all the other fisheries management data that are out there that are being used on the Atlantic coast.

That was done purposely from the very beginning, with the idea of that the MyFishCount data would be available to fit in with the rest of the entire discussion of fisheries management data, and so that's very important, and, I mean, one of the last projects that we worked on in developing MyFishCount is ways that we can automate the data that we collect and how we can look for people that maybe have made a mistake in their data entry.

For example, they say that they caught a 500-pound vermilion snapper. Well, we know that that's not going to be true, and we have to have a way to flag that, so that it doesn't -- We're not uploading erroneous data, and so we've got programs that are being written, and we've got an interface that will help us to snag those kinds of crazy things that are in there, so that we're sending up quality data that are coming up out of there and it's not just whatever anybody puts in there is being sent off, and so what we're getting is good quality data, and we're making it available to researchers.

MR. HULL: Thank you for that. You know, after pretty depression discussions prior to this on issues with recreational management and knowing where we're at, this is a really happy ending to



the day, I think, and so, if there's nothing else, thank you, BeBe. Wonderful job. Wonderful job to everybody that's been involved in this, and I'm going to hand it back to you, Myra.

MS. BROUWER: Thank you, Jimmy, and thank you, everybody. I guess what time would you like us to reconvene in the morning?

MR. HULL: Well, fishermen get up early, and so what about the 8:30 mark again? Does that work?

MS. BROUWER: Sounds good to me.

MR. HULL: Okay. Hold on. I've got a late hand here. Rusty, go ahead.

MR. HUDSON: Thank you. I am just going to go off segue. As a blast, go blue, Brian. Thank you for all of your help for all of these years. You've been a really useful part of the South Atlantic Fishery Management Council since you came from North Carolina, and I really mean that. Thank you.

DR. CHEUVRONT: Thanks, Rusty, and, after thirty-two years, the Dodgers finally did it.

MR. HULL: Brian, you're the greatest. I'm going to share some softshell crabs with you one day there, buddy.

DR. CHEUVRONT: Rusty is making reference to that I am retiring next month.

MR. HULL: Yes, sir. Congratulations. Okay. I guess that's it for this day, and it's been a great day, you guys, and we'll see everybody at 8:30 tomorrow.

MS. BROUWER: We'll be up and running at 8:00, and the plan is to start at 8:30 with Julia Byrd, who is going to talk to you all about Citizen Science.

MR. HULL: Thanks a lot, Myra. Thanks, everybody. Have a good night.

(Whereupon, the meeting recessed on November 5, 2020.)

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NOVEMBER 6, 2020

FRIDAY MORNING SESSION

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The Snapper Grouper Advisory Panel of the South Atlantic Fishery Management Council reconvened via webinar on November 6, 2020 and was called to order by Chairman Jimmy Hull.

MR. HULL: Good morning, everyone. Let's keep the good times rolling. We're going to have a really good session this morning, and it started yesterday afternoon, and I'm sure you all enjoyed

the MyFishCount presentation, and this upcoming Citizen Science presentation. These are beautiful things, great accomplishments, and thank you to everyone involved. Some AP members have been heavily involved in Citizen Science, and you'll see their work and their names, and all of the staff. Thank you very much. I am enjoying these presentations, and so back to you, Myra.

MS. BROUWER: Thanks, Jimmy. I think I'm going to turn it over to Julia Byrd, who is going to give you guys an update on the Citizen Science Program and what they've been up to. Go ahead, Julia.

MS. BYRD: All right. Good morning, everyone. As Myra mentioned, for those of you who I haven't had an opportunity to meet yet, my name is Julia Byrd, and I am the council's Citizen Science Program Manager, and then we also have Allie Iberle, who is the council's Citizen Science Project Coordinator, on the line as well, and what we wanted to do was give you kind of a quick update on what's been happening in the Citizen Science Program since you all met last fall.

The first thing I wanted to do was kind of give you guys an update on kind of programmatic-level activities, and so what the program has been working on, and then, in a few minutes, I will get down into some of our pilot projects and give you an update on those, and so, first off, one of the big things that we've been working on over the past year is developing kind of a program evaluation plan, and so we want to make sure that the Citizen Science Program is doing what we at the council want it to do, and so we've been working really closely with one of our advisory panels, the Citizen Science Operations Committee, as well as Rick Bonney and Jennifer Shirk, who are kind of our citizen science expert advisors.

We've been developing kind of goals and objectives for the program and then figuring out kind of what we want to kind of measure, what we think success looks like, so that, as the program moves forward, we're able to make sure that it's doing what we want it to do, and so all of this information is going to be presented to the council at their December meeting, and we're going to present to them some options of kind of how to move forward with evaluating the Citizen Science Program.

Then we also have a couple of Citizen Science Advisory Panels that have been meeting this year, and so the first one is our Citizen Science Operations Committee, and that group has been heavily involved in the program evaluation work, and so it has met a number of times, and Bob Lorenz serves on this group, and then we also have a Citizen Science Projects Advisory Committee, and that's a group that's made up of representatives from most of the council's different advisory panels, and that group will be meeting this year for this first time, later this month in November, and Jimmy Hull and Bob Lorenz are the two representatives from the Snapper Grouper AP serving on that committee, and Kerry Marhefka was on it as well, but she now has stepped down, as she's moved up to become a council member.

Something else that we were working on this kind of summer and fall with some of our NOAA colleagues is that we put together a symposium on citizen science at the Annual American Fisheries Society meeting, and the symposium really focused on how to kind of better incorporate this citizen science data into stock assessment and management decisions, and so we had a great group of presenters, and there were kind of twelve folks from all over the country, doing a variety of different type of citizen science work, and so it was great to bring them together and kind of learn from one another and share sort of best practices.

Then we've also been working on developing a manuscript with Rick Bonney about the development of the council's Citizen Science Program, and we've submitted it to get published, and we got some reviews back, and so we've been refining that paper, and we'll be resubmitting it soon, in the upcoming weeks, and then the last two kind of programmatic-level activities that I wanted to highlight are kind of the citizen science social media strategy that we started using and our citizen science email distribution list.

If any of you guys are interested in kind of keeping up with what the Citizen Science Program is doing month to month, these are two great ways that you can kind of be in the loop on what's happening.

For our citizen science social media strategy, Allie Iberle is really leading the charge here, and so, if you follow the council on social media, you may have noticed that, every Friday, we're doing posts about citizen science, and we're highlighting kind of the program and our different pilot projects, and we're also highlighting some of the really wonderful volunteers who have been participating in the program.

Then, with the citizen science email distribution list, we're shooting to send out kind of email updates every other month, and, again, that will be on kind of project updates and programmatic updates, if there are any special events coming up and that sort of thing, and that's kind of what we shared through that email distribution list, and so, if any of you guys aren't on that list, but you want to join, just let me know, and you can either kind of let me know verbally today, or shoot me an email, or get in touch with Myra, and she can let me know, and we'll add you to that list.

That's kind of a programmatic-level update, and now I wanted to switch and talk a little bit about projects, and so I'm going to be updating you guys on two pilot projects that are underway, SAFMC Scamp Release and FISHstory, and then I also wanted to talk a little bit about some of the projects we have under development as well, to let you guys know what may be coming down the pipeline.

The first project under development that I wanted to mention is one that's focused on trying to develop kind of an app or a website to collect information from fishermen and other folks on the water on rare species observations, and so the idea here is that having those rare species observations could help serve as an early warning system for shifting species. There's a program in Australia called Redmap that does this that has been very successful, and so we're trying to bring that program to the South Atlantic.

We're working with a variety of partners, and a professor at the University of North Carolina, Janet Nye, is leading these efforts, and so we've submitted a couple of proposals, none of which have been funded yet, but we are looking for other funding opportunities for that project moving forward.

Then another project we're working on developing is partnering with an organization called REEF, and it's trying to work with divers, to try to get length estimates from a few data-limited species, and we're hoping to pilot test this down in the Florida Keys, and so we would be trying to collect lengths on things like hogfish and some of the grouper species. We have submitted a couple of proposals for this project, and they haven't been funded yet, but we're actually putting together a

proposal right now, that's due at the end of the month, that can hopefully get this project off the ground.

Then there's one more project that we just recently started talking with folks about last week, and so it isn't on this slide, but we've begun talking with folks, with Jim Manning, who is at the Northeast Fisheries Science Center, and he's run a citizen science program for a long time up there called EMOLT, and that stands for Environmental Monitoring on Lobster Pots. It's a really successful project that's been going on for a long time, and so what they do is they attach kind of probe that collects bottom temperature, and, initially, it was just lobster traps, and they've expanded it to kind of trawl gear, as well as some longline gear, I think, in the Northeast, to try to collect information on bottom temperature.

They reached out to us last week, and they're really interested in trying to expand this program and bring it down to the South Atlantic, and so we will be kind of continuing discussions with them in the upcoming months as well, to try to figure out ways that we may be able to do that.

Then the last thing that I wanted to mention is a collaboration that we are working on with the Southeast Fisheries Science Center, and it's to kind of host a series of dolphin wahoo participatory workshops, and Mandy Karnauskas and Matt McPherson at the Science Center are the ones who are kind of leading this charge, and what we're trying to do at these meetings is develop conceptual models of the dolphin wahoo fishery.

What that really means, I guess, is we want to kind of bring together fishermen and other members of the fishing communities to learn about the dolphin wahoo fishery from them, kind of what the major factors are affecting the fishery, what the risks are to the fishery, what people value in the fishery, and then figure out all the way those different things are kind of connected to one another.

The plan was to hold a series of meetings in North Carolina and Virginia and then to hold another series of meetings down in the Florida Keys, and we were able to hold the North Carolina and Virginia meetings this year, in March, right before COVID kind of shut everything down, and we were planning to hold the meetings in the Florida Keys this summer, but those have been postponed, and we're trying to figure out now how we may be able to kind of reschedule them in the upcoming months, and so analysis is underway, and Mandy and Matt have been doing a lot of work on kind of the information that we learned at the North Carolina and Virginia workshops, and they've presented some of that information to the council and to the Dolphin Wahoo AP last week.

Those are things, kind of collaborations and projects, under development, and now I want to switch gears and talk a little bit about the pilot projects that we have underway right now, and the first one is the FISHstory project. You guys got an update on this at your meeting last fall, but we hadn't launched the project yet, and so we wanted to kind of give you an update now that the project is launched and we're collecting data.

This project is kind of using historic photos to try to document for-hire kind of catch and length composition data, and so Rusty Hudson, who is a member of this AP, is a critical kind of partner on this project. He has provided over 1,300 photos from his family's fishing fleet from the Daytona Beach, Florida area in the 1940s to 1970s, and those are the photos that we're analyzing as part of this pilot project.

The project has three main components, and the first is kind of digitizing those historic photos, and that part of the project is complete, and Rusty has done a ton of work kind of scanning all of these 1,300 photos, and he also provided a lot of kind of corresponding background information that make the photos even more valuable, and so things like kind of dates for trips, vessel names, captain names, homeport, all of that sort of information that really kind of rounds out the photo archive that we now have. Then the other two parts of the project, the for-hire catch composition and developing a method to estimate length composition, are underway now, and I will kind of update you guys on where things stand with those.

First, the for-hire catch composition part of the project, we're kind of doing this through an online crowdsourcing platform called Zooniverse, and so, last fall, Allie Iberle kind of gave you guys a demo of the FISHstory project in Zooniverse, and so it's a place where we can upload all these photos, and we've developed kind of training materials and tutorials, so that members of the public can help us kind of count and identify the fish and the people within these photos.

We finally launched the project in May of this year, and we have just been absolutely blown away by the interest we've had. Since launching, and I looked kind of -- I think it was yesterday morning, and we've had over 1,500 volunteers participate in the project, and they've made over 26,000 classifications, and so it's just been amazing that so many people have been interested in helping us analyze these photos.

I also wanted to update you guys on another kind of corresponding component to this for-hire catch composition part of the project, and that's kind of the validation team, and so, for every photo that is loaded into the Zooniverse FISHstory project, we have multiple volunteers, or multiple members of the public, kind of analyze and collect data on that photo. When the volunteers kind of disagree with one another, we have a validation team that kind of verifies the species and the counts in the photo, and so the validation team is made up of fishermen and scientists, and there are a number of folks who are on this committee who have volunteered to participate on that team.

The validation team kind of helped us during kind of the beta test of the FISHstory project, and then, in the upcoming months, they'll begin verifying the live Zooniverse data for us, and so, once that gets underway, we're hoping to have somewhat kind of regular meetings with folks, to kind of help us verify those tricky photos, and then we're also starting to kind of analyze the live Zooniverse data as well, helping figure out which photos need to get kicked to the validation team and which photos we can use kind of the volunteer information for alone.

Then the last component of the FISHstory project is this length analysis, and so we're trying to kind of develop a method to estimate lengths of fish within these photos, and so, to do that, we're using kind of the lumber, the two-by-fours or the two-by-sixes, on the leaderboards where the fish are hanging as a scale to kind of estimate fish length, and so we've developed a protocol, and we're testing it now on king mackerel.

We have five analysts that have been trained and are helping us measure fish in photos. We have completed measurements on kind of 400 photos to date, and then Chip has really been leading the effort to develop a method to kind of take these lengths and develop them into kind of length compositions, and, ideally, what we would love to get is kind of length compositions for every year, or every couple of years, during this historic time period.

One thing that's been pretty exciting is, over kind of the past couple of months, we have kind of shared information on our methodology with the lead stock assessment analyst for the South Atlantic king mackerel assessment, and then we also presented kind of our methodology to the council's SSC, at their meeting last month, and both of those groups have been really supportive of this project, and they think that this length information could be really useful, and so we're really excited that they kind of like what we're doing, and they also have been able to provide us some suggestions to kind of improve methodologies as well.

Then the last thing I wanted to mention about FISHstory is kind of outreach and promotion, and so the FISHstory team, as well as the council's outreach team, which you heard about yesterday, both from Cameron and BeBe, have really been working hard to kind of share information and spread the word about this project, and we've been really excited, because there's so many different groups who have been really interested in this project, and so we've had several kind of features within blogs and podcasts and newsletters, and so, within this slide, each of these kind of bullets is a link to some of these articles, and so I would encourage you to kind of check them out and see what great features we've had on the project.

One in particular that I wanted to mention was, I think about a week-and-a-half ago, we did a guest blog post in *Discover Magazine* that published, and so it's a great article, and I would encourage you guys to kind of check that out.

Now I wanted to talk about kind of our first pilot project, SAFMC Scamp Release, and give you guys an update on where things stand here, and so this was our kind of first pilot project, and it's focused on collecting information on scamp grouper discards using a mobile app called SAFMC Release, and, for this project, we're really trying to focus in on collecting data that will fill data gaps that are needed for kind of assessment or management, and, in particular, we're trying to collect information on the length of released fish as well as information that will inform kind of discard mortality, and so things like the depth the fish was caught, whether or not a descending device was used or the fish was vented before it was released, that kind of stuff.

The app initially launched in June of 2019, and so, since then, we've been working on kind of recruitment and retention for commercial, for-hire, and recreational fishermen, because we're trying to collect this information working with fishermen from all sectors. We celebrated kind of year anniversary, so to speak, in the summer, and so we provided kind of an annual update to project participants then, and we've also provided the data for review at the SEDAR 68 Gulf of Mexico and South Atlantic scamp data workshop, which took place over a series of webinars kind of this spring and this fall.

We have collected kind of limited data thus far, but some of the preliminary feedback that we got from SEDAR 68 participants is that the kind of data provided by SAFMC Scamp Release users and collected through the app were kind of very helpful in interpreting trends in other datasets and that folks were interested in kind of seeing this again, once we have kind of a larger sample size, and so the data workshop report for this stock assessment will be out soon, and so we're planning to kind of share that information with participants as well, once it's available.

We're also working with a College of Charleston graduate student, Nick Smillie, as part of this project, and so his thesis research is really focused on trying to identify strategies to market these

self-reporting fishing apps, to try to improve participation. There are two main parts of his project. The first part of his project is he wants to kind of interview fishermen who have SAFMC Release accounts, to learn more about their perceptions of the SAFMC kind of Release app and some of these other kind of self-reporting fishery apps.

He's really interested in talking with fishermen both who have used SAFMC Release to report information on scamp and those who have not had an opportunity to use it yet, and so the interviews are relatively short, just thirty to forty-five minutes, and folks who kind of complete interviews will get a twenty-five-dollar gift card to West Marine that's being provided through the College of Charleston research funds.

I know a number of you guys have SAFMC Release accounts, and so I would be really grateful if some of you guys may be willing to talk to Nick and share your thoughts on kind of SAFMC Release and some of these other kind of self-report fishing apps, and so we are sending an email out this morning to kind of ask for participants, and so, if any of you are willing to do that, please reach out to me, and I can get you any details and answer any questions.

The other aspect of his project is really digging in further to some of the MyFishCount information that Brian and BeBe presented to you yesterday, and so looking further into the surveys and doing some further analysis of all of the different marketing strategies that BeBe has implemented over the past year, and so we're really excited to see the outcomes and results of his project.

Then one other thing that I wanted to mention that we're excited about, as far as kind of this project goes, is we received a grant proposal that we're working on right now, and it's working to combine this SAFMC Release app with North Carolina DMF's Catch U Later app, which was based on our Release app, but, instead of collecting information on released scamp, it's collecting information on released flounder, and so what we're trying to do is to combine the apps under kind of ACCSP's umbrella.

ACCSP is kind of a group that I know Brian mentioned yesterday, but it's kind of our regional data management partner here on the Atlantic coast, and, by doing this, we're going to be able to expand SAFMC Release to collect information on all shallow-water grouper, and not just scamp, and we're hoping to kind of kick off and launch that expansion in early 2021.

Another part of this project that we're really excited about is that we're hosting a series of scoping meetings for the development of a customizable kind of citizen science app, and so the idea here is to try to kind of develop an app so that you're able to build the app out on the fly, and so, if there's a citizen science project, and you want to use a kind of app on a cellphone to collect data, you would be able to kind of build that app on the fly, based on certain identified data fields, and so that would make you be able to kind of launch that kind of app much more quickly and much more cost effectively, and so what these scoping meetings are trying to do is to really figure out kind of what the data needs are, what the citizen science data needs are, and what fields would need to be included in this app to make it kind of relevant for us here in the South Atlantic and for others along the Atlantic coast.

It's really important that we have fishermen participate in these scoping meetings. We want to hear from you guys what you think kind of citizen science data needs are and what fields would be important to include in this app, and so the scoping meetings are going to be a series of short

webinar meetings between January and March of next year, and I think Myra sent some information to you guys via email about this, but, if you're interested in participating, I would love to hear from you, and I know that Jimmy Hull has contacted me and is interested, but I would love if there are one or two other folks who may be willing to participate in these meetings.

The last thing that I wanted to say about SAFMC Release is that, once we expand to collect information, not just on scamp grouper, but on all shallow-water grouper, we're really going to need help kind of promoting and recruiting new users for the app. When we launched the app back in 2019 to collect information on scamp alone, we tried a lot of different avenues to kind of connect with scamp fishermen, and we did news releases and kind of other media, and we had one-on-one contact with folks, and I called a lot of people and met people and emailed people, and we went through kind of some fishing organization newsletters, some fishing club contacts, and we did social media posts, and we were really lucky to have several of you guys willing to sign up and help us collect data or help connect us to other folks who kind of fished for scamp in your areas.

When we expand the app again to all shallow-water grouper, we may look to you guys for some help again, if you're willing, and so, in particular, we're wondering if you think there are other avenues that we should kind of consider to promote and recruit folks to participate once the app expands and, if any of you guys are willing to help us spread the word about the expanded app, that would be wonderful, or, if you're willing to help connect us to others in your area who may be fishing for some of these grouper species, we would really appreciate it.

I will kind of pause here, and I'm happy to take kind of any questions on kind of any of the work that the Citizen Science Program is doing, and then, in particular, we're looking for some feedback from you guys on ways we can promote the app, the SAFMC Release app, once we expand to kind of all shallow-water grouper, and then I would also love to hear if there is anyone interested in participating in these citizen science app scoping meetings in the winter of next year, and so thank you so much for your time this morning, and I am happy to take any questions or comments.

MR. HULL: Well, Julia, thank you very much. What a great program that you all have developed and all these measures. You know, fishermen have been looking for a long time for a way to better inform the science and what we see on the water, and these are programs that are doing that. Okay, AP. What have you got? Have we got some people willing to jump in here? Raise your hand. Andrew Mahoney, you're up.

MR. MAHONEY: I think that maybe having something that the fishermen can use, maybe based upon a forecast or something like that, on the app may help, and so, like the people on my dock and myself, most of the apps we look at are weather-related, and so that may help get some people on it.

MS. BYRD: Thanks, Andrew. I know the Release app is a little simpler than MyFishCount, which has a great weather feature, but that may be something that we want to kind of look into, and so thanks for that suggestion.

MR. HULL: Anybody else? Okay, Julia. It looks like that's it. It's a good well done.

MS. BYRD: Thanks, and, again, one more plug. If any of you guys are willing to help in participating in these scoping meetings to develop this kind of customizable app, we would love



to have you participate, and, if you can't -- It will be a series of around five meetings, but, if that is kind of too much of a time commitment for you, that's fine. I would just feel like it's really important that we have fishermen involved, and so, if folks are willing to participate, I would, again, love to hear from you now, or I would love for you to kind of reach out to me offline.

MR. HULL: Robert Lorenz, you're up.

MR. LORENZ: Julia, great work, and I've been with you and watching you this whole way, even from the start, when Amber was there, and you were there at the initial meeting, and I will respond to you offline and separately, because I want to give some names and all and some ideas for your scoping meeting. I myself have not volunteered myself, because I'm a little -- I feel overutilized, and I want to focus on things like your Ops Committee and things, but I do know some people, and I will tell you, with me, and we can talk a little more, and if it weren't for the others, and so they could speak on the topic too, but with the demographics.

I'm a sixty-six-year-old guy, and apps kind of intimidate me, and so I'm not real great at it, because of things like they require passwords, and, for some reason, it's tough for me, and I don't know if that's an issue, but just to inform you of that, in case others may feel that, and I didn't feel that scoping out an app is going to be something in my wheelhouse, because of being kind of a rather poor user, and so I just wanted to let you know that, but, with that, I think I will have a discussion with you offline and give you a few names of people that might help and that you will explain to them, and they will be knowledgeable of the fact that, ultimately, using an app and helping you design one is a pretty big job. I mean, for me, there's enough difficulty just using them and keeping up with them and all.

MS. BYRD: Thanks, Bob, and I will definitely follow-up with you offline, and I appreciate your kind of willingness to help us kind of identify some folks, some fishermen, who may be interested in this, and I think your kind of comments on kind of using apps and how apps can be kind of intimidating is something that definitely I've kind of heard from a couple of different fishermen that I've talked to when trying to kind of recruit people for the SAFMC kind of Release app, and I think, for these scoping meetings, having app experience, or being comfortable with apps, isn't something that is kind of necessary.

For this kind of early stage, we just want to figure out what are the types of data that we want to collect and then what data fields do we need for those, and so I don't want folks to feel intimidated about participating in these scoping meetings. It's not getting down in the nitty-gritty of the apps, and it's more kind of big-picture ideas of what types of information do we want to collect and what data fields would we need to do that and can be collected on the water, and so what can fishermen collect when they're out doing their normal activities that won't kind of disrupt kind of what they're out on the water for, which is catching fish.

MR. LORENZ: Very good. Then I will recommend that you do a re-send and put some of that in, and do you know what I mean? You may need something with a little attachment of -- I don't want to call it a terms of reference, but what your objectives are for the use of the volunteers, because what you just stated is not so intimidating, and it's just like this AP. You can be very valuable just by giving an opinion on something that nobody else knows anything about, and so I will give that to you as a suggestion. Maybe that will help you get a few more answers.

MS. BYRD: Thanks, Bob.

MR. HULL: David Moss.

MR. MOSS: Thank you, Jimmy. Julia, great stuff, and I agree with a lot of what Bob said, though I will say I guess the reverse to that is, as we move forward and try to recruit the next generation of fishermen and conservationists, app creation and app use is going to be key moving forward, and so I would love to be able to help in any way I can, and I probably fall somewhere in the middle of apps being intimidating and knowing that it's a way of life now, and, again, anything I can do to help, and this is all great stuff.

MS. BYRD: Thanks, David. I may reach out to you afterwards, to see if you have suggestions of folks that may be good to kind of try to see if they're willing to kind of participate in these meetings, and so thank you.

MR. MOSS: Absolutely. Let me know.

MR. HULL: Thanks a lot, David, for that. Andrew Mahoney, you're up.

MR. MAHONEY: I just wanted to say, with the app, when people are looking at their phones, and there is other apps on there, a lot of times, those apps have people hired behind those that are almost trying to get you addicted to the app, to keep you looking at your phone, and another is having this app -- I mean, that's what it's up against, is when people's attention is on their phone, and they're up against an addiction with that, and I just wanted to put that out there to you, that it's not going to be easy to gain people's attention away from what they are already addicted to, and a lot of it is social media, which may be a good thing for this, maybe some kind of picture-sharing thing, where people could comment or something like that. Anyway, that's all.

MS. BYRD: Andrew, I think that's a really good point, and, I mean, it is kind of what we're kind of up against, and I think the other thing that may be worth mentioning is I know that it seems like folks are inundated, and there are so many different apps available and things like that, and one of the things we're trying to do with this kind of citizen science kind of customizable app is have kind of one app that would have multiple -- That could have multiple citizen science kind of type projects, data collection tools, and so there would be -- If you were collecting information on released shallow-water grouper, you would log into the app and say I want SAFMC Release information to pop up, and so, if you were participating in multiple citizen science projects, or if you wanted to, you wouldn't have five new apps on your phone, and it would be one app that you could collect information on one or two projects that you may be interested in, and I think that's where we're trying to go with this kind of customizable app.

I think you made kind of a lot of good points against -- Or a lot of good things to consider when developing an app, and there are lots of different apps out there that are designed to make you use them over and over, and so this is a little bit different, and it's something that we'll need to think about in the development, and so thank you.

MR. HULL: Thank you, Andrew. Harry, you're up.

MR. MORALES: How large of a population do we have using this app now?

MS. BYRD: It's relatively small. There are about I think fifty-two-ish folks signed up, and, again, I think this is -- At least from talking with folks, I feel like the scamp fishery is a somewhat specialized fishery or -- From talking with kind of folks as I was kind of trying to recruit folks to the app, and you know these fish are caught in slightly deeper water than many of the shallow-water grouper species, and a lot people aren't releasing scamp grouper.

From what I heard from folks, a lot of people would only release scamp that are undersized, particularly in the kind of open season, because the bag limits aren't limiting. They aren't hitting their bag limit, and so I think some of those reasons are the reasons that we've collected limited data thus far, but, yes, we have around kind of fifty-ish so people, and it's spread between the four states and the sectors.

MR. MORALES: Okay, and clearly you have decided that this would not be something to be incorporated into MyFishCount, for example, and you need it to be separate.

MS. BYRD: Well, it's kind of a separate project, but one thing I will note is that you can kind of -- This project was designed to collect kind of targeted information on released fish, and it was concentrating on just -- Trying to be simple and just collect the information that could be used or would be most helpful, I guess, to the stock assessment, based on kind of some of the scientists we were working with, and so it is kind of simple, and it takes you, once you have an account set up, less than a minute to enter kind of information.

This information can be reported through apps like MyFishCount, and so you can report kind of information on released fish as well, and MyFishCount has a lot of other information that you can select as well, information on kind of kept fish as well as released fish, and so this is just trying to be a simplified kind of app, really focused on kind of filling a data need on released fish.

MR. MORALES: Okay. So I'm new to the group, and to all of these I think incredible measures. My initial reaction to this is this is geared toward that scientifically-oriented, or supportive, fishermen that would want to provide data, and I would be curious as to whether or not a tagging component, especially since we're releasing the premature scamp, if that would be something that would be incorporated in a project like this, because then, if somebody else catches that scamp and happens to be of size, that would be information for you, but, if I were recruiting fishermen, I guess I would be recruiting those that do have an interest in contributing to the kind of information, as opposed to bellyaching about it. I think I would like to talk to you afterward, because I think I would like to see if I can contribute some time to it. I am very app oriented, and so you have a volunteer.

MS. BYRD: Thanks so much, Harry. I appreciate that, and I will kind of follow-up with you after this, to chat more, and I think some of the folks who are using the app did ask about a tagging component, and they asked if there was interest in tagging fish, and so I think that's something that has come up from a couple of the folks who were using the app, and so I kind of appreciate your feedback, and I look forward to talking with you more.

MR. MORALES: I think when -- I know, down by us, the dolphin tagging generated a lot of interest on charlestonfishing.com and things like that, and people were engaged, and I think that would be a -- It's more meaningful. I mean, yes, I can give you the information, but, if I'm actually

contributing to what's going to be coming, as well as helping the rest of us with proving that there might be more fish out there than the scientists are aware of, and it's just more meaningful, in my opinion.

MS. BYRD: Thanks, Harry.

MR. HULL: Thank you, Harry, for volunteering to do that. That's great news. It doesn't take a lot of observed data points and information to be helpful in these stock assessments. They have some very small sample sizes, and scamp being a specialized kind of regional fishery, where people catch a lot of scamp, and you're not going to have tons and tons of information, but it doesn't take a lot to be helpful. Thanks a lot for that.

MS. BYRD: Just to add on to what Jimmy said too, I mean, I think there is very little information on the size of released fish that were available for the scamp assessment, and so I think kind of this project could really help fill a data gap, because there's not a lot of information, and a lot of the kind of traditional data collection programs we have are measuring fish kind of back at the dock, and so you don't get information on discards, other than kind of the small kind of observer programs that we have that are kind of really limited in our area here in the South Atlantic.

MR. HULL: Guys, if you know guys and gals, people that catch scamp regularly, please push them to this app, to help out. Thank you, Julia.

MS. BYRD: Thanks, Jimmy, and thanks, everyone, for your time this morning.

MS. BROUWER: Jimmy, I'm going to take control back, and I guess we can move into the next bit of information, which is just going to be an update on an initiative related to climate change, and so let me just take control back here, and give me just a second.

MR. HULL: Perfect.

MS. BROUWER: What I'm going to do is just give you a very brief update, and this was at the request of the council, and they discussed, in September, an initiative that's been sort of in the works for a little while, and not that long, with other management agencies along the east coast, to try to get ahead of issues that are going to be popping up relative to the change in the distribution of species or the range expansion of species as a result of climate change.

The council, when they received the update, they requested that we regularly keep the APs informed of any discussions that take place around the council table, so that you all are aware that the council is having these discussions and addressing some of these issues that are affecting everybody, and so, obviously, we are facing a lot of different challenges coming up related to uncertainties in our environment, and climate change being one of the main things, but, obviously, there is other related factors, such as alterations on global markets and, of course, the pandemic right now, and so how can managers take these unpredictable events into consideration when they are making recommendations to maintain fisheries sustainably and continue to manage them effectively to benefit coastal communities along the east coast? How can councils plan ahead for these changes?

The several regional management agencies on the east coast, both councils, the New England Council, the Mid-Atlantic Council, the Atlantic States Marine Fisheries Commission, and the National Marine Fisheries Service have been discussing something called scenario planning as a potential tool to start having these conversations and addressing challenges that we know are going to be coming our way, and so this is just going to be an opportunity to evaluate what is going to be happening and what challenges are going to be facing fisheries managers in the not-so-distant future.

Scenario planning is basically a tool that allows managers to create scenarios based on many factors, and so it's kind of like a very qualitative model, if you will, and it allows managers to identify these uncertainties and discuss ways that they're going to potentially deal with them, and so the idea is to get a lot of different participants together and consider these different possible future states of the environment of our world and together develop these robust strategies to address these uncertainties.

Scenario planning has been used so far in other agencies, and the Pacific Fishery Management Council is doing a scenario planning project to address challenges related to climate change on the west coast, and NOAA Fisheries has also used this approach, I believe, to look at changes in right whales as a result of climate change, and so it's not something that's entirely new, but we along the east coast are trying to figure out how to apply it to specifically the challenges that are going to be coming our way in fisheries.

There was a working group that was formed in 2019 and the Northeast Region Coordinating Council agencies, member agencies, which consist of the two councils that I mentioned, the ASMFC, the Greater Atlantic Regional Fisheries Office of NOAA Fisheries, and the Science Center up in the Northeast, convened this working group that was made up of all these representatives, and I'm included in that working group, and that's why I'm delivering you this update.

We were tasked with looking at what the scope of the project might be, and there hadn't, at that point, been any commitment from these agencies, and they just say, hey, we need more information, and we need to have an idea of what such a project would look like, how much it would cost, how we would go about gathering people, participants, and who would be involved, and so all these things we sort of brainstormed, and we put together a proposal of different options and different costs and different scopes of a possible project, and we presented that to them in July of this year.

Here's a summary of the recommendations that the working group came up with, and so it's mainly dealing with how such an initiative would be structured, right, because it's a lot of agencies, a lot of people, and how would we go about making it more effective, and so there would be a core team that would consist of members from these various agencies.

The suggestion was to hire a professional facilitator with experience in this type of an exercise and bring in committees on the council level, and so committees would be made up of maybe SSC members and council members, to sort of advise the project, and really make sure that there's pretty robust public participation, and, of course, here's where things get a little uncertain in our current environment, because, initially, when all these talks started happening, we thought about

having workshops up and down the coast and bringing people together, and now, of course, things are a little different.

The Nature Conservancy has offered to provide some funding that could be used, perhaps, for the facilitator or for costs related to the workshops and things like that, and so these are just recommendations that were brought in front of the council, and they discussed it, as I said, in July, and there was general support, but still a lot of uncertainty.

The Mid-Atlantic Council has been working on priorities for 2021, and they are finalizing their priorities, and they are pretty committed to this. Our council is as well, and they discussed this, as I said, briefly at their last meeting, and there was support for it. They want to know more about it, and so they have requested that we bring to them a more detailed presentation, probably in the springtime, and they're going to be talking also about where this is going to fit in their priorities for the coming year. This is basically it, and I just wanted to make sure that everybody was aware of what was going on there, and so, if there's any questions, I would be glad to answer them.

MR. HULL: Does anybody have questions on this topic? Robert Lorenz, you're up.

MR. LORENZ: I don't have a question, or, well, there may be, but more or less a comment to help. I have been following things on climate change, even going to some symposiums, et cetera, that I pay out of my own pocket, just as an interested citizen, and one recommendation that I would like to make to you as a fishery manager, and anybody else that's a fishery manager, and let's say the SAFMC, is there is a huge political component to climate change, and there are various things going on.

I think, for the purposes of gathering the most support you could as a fisheries manager, and particularly among I'm going to guess that, among fishermen, a lot of them being a little more conservative, is -- When you're partnering with an NGO on anything, they get real -- I would suggest, and this is just my personal opinion, to make it real clear that, as fisheries managers and the SAFMC, you're looking to address the effects of climate change, and focus on there, the effects to the fisheries and not the cause.

You won't get a lot of argument on the effects, because you will have your data, and there is constantly talk on many APs and the council of how the changing ocean, with respect to temperature and things, is changing where species are, and one of the things that I like to bring up is that's providing a problem for some people, like our own Chair, and that presents a problem in Florida for sea bass, something he targets, but it's providing an opportunity for people north.

Here in southeastern North Carolina this year, we actually had a bunch of tarpon, ten to thirty pounds, show up in our ICW, in back waters here, right outside near my house. Nobody knew how to fish it but the fishing guide that I go with, who is probably one of the most expensive in the area, and this presents an opportunity. Therefore, my advice is to be agnostic about the cause with respect to fisheries and be conscious and push what the outcomes and effects are, and then the things you would like to do, or you think you need to consider doing about it -- The climate is definitely changing, and you can't argue that.

We can argue whether it's fossil fuels or celestial events, et cetera, and I suggest don't go there, but then, after you have the effect and the species are moving around in abundance and ranges and

things like that, that has profound effects on the fisheries. What do we want to do and address it, and keep in mind so that many people go on the negatives, and there are some positive opportunities with climate change, and you can look for those. Look for what positives there may be for some of us as fishermen, that there are new species that we can pursue, and others may be given up, and so I would just like to offer that, kind of as a strategic thought.

MS. BROUWER: Thank you, Bob. I appreciate those comments.

MR. HULL: Thank you, Bob. Kerry Marhefka.

MS. MARHEFKA: Hi, all, and I'm sorry to interrupt your AP meeting with my comments, but I think I was one of the people who had suggested sort of this presentation to the APs, and one of the reasons why is because I just wanted to make it clear to you all that we sit around these meetings and we look at things like red porgy and red grouper, and we don't really -- You know, we feel like we've done everything we can, from a managing the fish perspective, and we're still not seeing results, and I just wanted to be very clear that, while we're not where we want to be on climate science and sort of using them in our assessments and things like that, it's not falling on deaf ears.

As a council, we know that we're doing -- You guys are sacrificing a lot, and there are outside influences that are affecting this, and I wanted you to know that there was some work happening at a higher level, and I was in new council member training earlier in the week, and I saw even more things that made me feel better about the fact that we're going to be able to get a handle on some of this, eventually, and I think it's going to take longer down here than it is in other parts of the country, just based on resources.

This is sort of my way of saying that I get the frustration, and we can -- Some of these species, we can set fishing mortality to zero, and we're still not going to see what we want to see, and there are things outside of our influence that are happening, and one of the things that I thought was interesting, and I don't know if this will come to fruition, but that I learned this week is there's a whole group of people who want, in the next Magnuson, to -- Instead of calling something overfishing, overfished, it would be called depleted, sort of indicating that it's not necessarily the fishing that's causing the species to not recover, and there are other things.

Like I said, I don't know that that's going to happen, but I just wanted all the AP members to know that we're all seeing the same thing and that we are paying attention, and we're going to do the best we can with climate science, and so I hope you find it helpful. Again, I'm sorry for the interruption, but I was just really thrilled, from a fishing perspective, to know that this is being discussed at a higher level.

MR. HULL: Kerry, thank you. You can interrupt any time, and that was good information and good insight on what's being considered, and that does make us feel better. I appreciate that. Andrew Mahoney, you're up.

MR. MAHONEY: I agree a lot with what Robert said, and one thing that kind of made a thought pop into my head was the planning ahead part. I mean, what changes are predicted, and how many possible scenarios are there?

MS. BROUWER: These are the things that we would be fleshing out through this process, Andrew, and we really don't know, and that's why we feel it's important to engage all the management agencies up and down the coast, so that everybody is at the table and everybody can be speaking to what they are seeing, so we can have all the information needed to develop these scenarios and then try to figure out how to address them.

MR. HULL: Good questions, Andrew. James Paskiewicz, you're up, please.

MR. PASKIEWICZ: Good morning, everybody. I mean, it seems pretty generalized, when we're talking about climate change and trying to run scenario models of what might happen. I mean, maybe we should put out a few suggested more finite topics, like fishing boundaries change with shifts in biomass, and what scenario gets run when these fish that we're catching in the southern zones are getting caught in northern zones, and then run models based on that specifically, from a management standpoint.

Then you can maybe flow into working waterfront. I mean, we've seen water level rise in the Keys, because we are so flat, for the most part, and, when we're seeing the king tides, we're seeing them flood into city streets and stuff like that, and so I think that working waterfront and oceanfront availability to dock boats and stuff like that might be another point to emphasize and really have a starting point to where you want to run these models from and what exactly it is that that might look like with climate change. I mean, from what I've heard already, it just seems very broad-sweeping, and, yes, we acknowledge that climate change is happening, and I don't know, but I think we've got to narrow it down a little bit, to be a little bit more concise. Thank you.

MR. HULL: Thank you, James. Good comments. We're seeing the higher water here too in northeast Florida. Jack Cox, you're up.

MR. COX: Thanks, Jimmy. I just wanted to say that, when I think about climate change and what I've seen since the 1980s, it seems like things are really happening fast here. Climate change is on a fast track here in the last five years, things that I have started seeing here in North Carolina, but nothing drastic, and I think this is a great opportunity, and we may need to start thinking about some citizen science and start working on this, being that we're on the water and seeing things.

Like if you guys were to tag some vermilion or yellowtail, just to see how far some of those species are coming up our way, especially -- I am on the northern boundary of our management zone, but I just think about citizen science and maybe ways that we can have some input as fishermen and contribute to some of the work that's going to be going on, and there are just so many unknowns.

Jimmy, I think a lot -- When I think of things that I am noticing, the Northeast is just getting an incredible amount of black sea bass quota added to their ACL, and I'm seeing a decline in our bass that we've had over the years, and I sometimes think that maybe some of our bass are tracking north, and I don't know that for sure, because our water is just not as cold as it was, and the bass like that cold water. Anyway, I just wanted to throw that out there. There's just going to be a lot of things going on, and we're going to start talking about allocation issues on species and all kinds of stuff that will be happening, but citizen science will be a perfect way for us to start kind of getting ahead of it, maybe. Thank you.



MS. BROUWER: Thank you for that, Jack, and, Jimmy, if I may just address those comments that Jack and James brought up, real quick. The idea of this scenario planning thing is to involve fishermen in the process, and so these workshops that I mentioned, even though we haven't fleshed out who the participants are going to be exactly, and the idea is for a lot of those workshops to be geared towards getting information from you all, and so be on the lookout this coming year for more information about this, for ways in which you guys can be involved in all these conversations.

MR. HULL: Thank you for that, Myra, and I forget -- Was it this presentation or a previous one where they were putting temperature gauges on -- It was a citizen science project in the Northeast, but temperature gauges, recorders, on traps, lobster traps, and things like that that are involving the industry, the stakeholders, and recording temperature and possible changes, and so that kind of stuff is really good. Thank you. David Moss.

MR. MOSS: Thank you, Jimmy. Myra, you kind of said exactly part of what I was going to say anyway, that one of the whole purposes of this initiative is to get the input and be able to kind of, for lack of a better term, narrow down areas of focus as it relates to climate change and how it affects the fisheries, and then I just wanted to further echo what it was that Kerry said, that we go through these steps, and we talk about what our take is and what effect they're having on fisheries, we as fishermen, which is -- Obviously, we have a huge impact, but it's very important that we look at what impacts the environment and climate is having on our fisheries and how it's changing things and what we need to do to be proactive to ensure that these fisheries last for years to come.

MR. HULL: Thank you, David. Anybody else have some comments or questions or concerns or suggestions? Back to you, Myra.

MS. BROUWER: Thank you, Jimmy, and thanks, everybody, for those comments. Right now, we're going to switch to our last presentation of this meeting, and I've got on the line Karyl Brewster-Geisz, who is going to give you a presentation on shark depredation, and so let me get Karyl on the line here, and she is with the Highly Migratory Species Division of NOAA Fisheries.

MS. BREWSTER-GEISZ: Thank you, everybody, for having us, and it's always good to meet new people. I wish I could be there with you. I will give you a little bit of information about what we know regarding shark depredation and our management history and along with the current status of the commercial and recreational shark fisheries, and that's basically just to bring all of us up to the same page.

Depredation is not a new problem. When you're out fishing, you're always going to have some fish eating other fish, and that is true especially with sharks that tend to prey on all the other fish, and we do recognize that there are a lot of potential impacts, both commercially and recreationally, with shark depredation.

The interesting part about this is that we are getting more and more reports of it over time. When I first started in Highly Migratory Species back in the mid-1990s, we almost never heard about shark depredation. We knew it was happening, but nobody ever called to report it or raise concerns about it, but, over the past couple of years, this is one of the more frequent phone calls or response to emails that we have. It appears that it is happening throughout the Atlantic, Gulf of Mexico, and Caribbean in all fisheries, and it appears to be increasing, based on the phone calls we're getting.

Both this council and the Gulf of Mexico Fishery Management Council have requested action to try to solve this problem, but what we do about it really might be limited. That's because there is a lot of inconsistent or no reporting of depredation events. While there are apps available that do mention depredation, it isn't clear what species is being -- Is the culprit.

It could be sharks in the Gulf of Mexico, or it could also be dolphin, or it could be another species, and, even when we talk to people, not everybody is able to identify what shark it was that was the culprit, though there are a lot of people who report some species, such as sandbar, dusky, silky, blacktip, the whole list that I have up there, and a lot of these species have very different stock statuses, and so, for example, for dusky sharks, the recent assessment showed that it is overfished with overfishing occurring, while blacktip sharks in the Gulf of Mexico appear to be very healthy, and then we have some stocks that are rebuilding. As I said before, it appears to be happening everywhere, in all fisheries and all regions.

Taking a step back, we wanted to share with you a little bit of information about our shark fishery, because I don't think all of you are shark fishermen, though you may be aware of the shark fishery itself. In short, our management started in 1993, with our first shark fishery management plan.

That FMP established three complexes for thirty-nine species, and those complexes I think you have probably heard of. They are pelagic sharks, and those are the sharks that were caught on pelagic longline gear, along with recreationally out in the ocean, and so if you think of Mid-Atlantic tournaments for blue sharks and mako sharks. You also had large coastal sharks, and those are the sharks that a lot of people tend to think of when they think of the shark fishery, and these are the primary commercial species, and they were caught primarily on bottom longline gear, and these are sandbar, dusky, blacktip, and then you have the third complex of small coastal sharks, and these were the sharks that were caught in gillnet gear, along with nearshore recreational fisheries, and so these are sharpnose and bonnethead.

The FMP managed those three complexes separately, and so all of those different species were managed together in the three complexes. In 1999, because of concern about the large coastal complex, we implemented limited access, and, since then, we have increasingly managed the shark fishery at a species level, and so we have -- For instance, sandbar has its own quota, and actually its own fishery, the shark research fishery, but then we also still have some species that are managed in management groups, and we still have what we call an aggregated large coastal group, which is different between the Atlantic and the Gulf of Mexico.

In total, we manage forty-two species now, and this says forty-five stocks, and I really think it's forty-six, and this is some of our species, such as blacktip, were discovered to have two stocks, one in the Atlantic and one in the Gulf of Mexico, and so we have different species that have different stocks.

Overall, from 1993 until about 2015, the commercial quotas for large coastal sharks were harvested fully, oftentimes exceeded, and it happened really quickly, and so most of our management, up until recently, has been to try to not exceed the quota and to provide time for the quota to be reached throughout the year, instead of all at once in just a few weeks or months.

This slide and the next slide give an idea of the abundance of large coastal and small coastal sharks, and this comes from our recent stock assessments, and so the X-axis are the years, and the Y-axis is the abundance level, and then that dotted line at one indicates whether the stock is above or below the MSY. If you look at sandbar shark, and that is that dark-blue line, it starts off pretty steady, and then it drops down in the 1990s, and it's currently starting to rebuild, and so that's really good news for sandbar. Dusky is a prohibited species, and we prohibited it around the year 2000, and it is that red line, and, as I mentioned earlier, the last stock assessment found that it's overfished with overfishing occurring, despite being prohibited.

Scalloped hammerhead is overfished, and we have a stock assessment happening starting next year, and it's a research track, and it will take a couple of years to finish, and I am hopeful that that will have much better news, once the new stock assessment is done, and then we have Gulf blacktip, which, as you can see, is a really healthy stock.

This is the same type of information, but for a different group of sharks. These are our small coastal, along with our smoothhound, or smooth dogfish. As you can see here, as with the large coastals, there is a variety of stock statuses, and so smooth dogfish and the smoothhound complex, which is what is managed in the Gulf, are both healthy, but we do have a number of stocks, like the blacknose in the Atlantic, that is overfished.

We are also actively managing the fishery as much as we can, and so, currently, we have Amendment 14, and Amendment 14 is out for public comment. This amendment would restructure how we derive our quotas, and so it is looking at a tiered approach for an ABC control rule, and it's looking at removing some of the quota linkages we have, and so, right now, hammerhead sharks and the aggregated large coastal group are linked, which means, if one is open, they are both open. If one is closed, they are both closed. Under Amendment 14, that might be removed, and there are a lot of other things in Amendment 14 that we're considering including recreational quotas.

We have a number of closed areas for pelagic longline, bottom longline, and a few others. Some of these areas have been closed for over twenty years, and so we're looking at ways of how we can collect data from those closed areas, to see if the closed areas are still accomplishing the goals they were originally established for.

We have an Atlantic blacktip stock assessment that is almost done, and the peer review process was finished yesterday, and, tentatively, it looks like Atlantic blacktip are healthy, which is great news, and this stock had not been assessed since 2006, and so it was long overdue. As I mentioned before, the hammerhead shark assessment will start next year, and it will take several years to finish, and we also have biological opinions that we need to implement specifically for sharks. Oceanic whitetip throughout its range, which is worldwide, and scalloped hammerhead in the U.S. Caribbean and south are both listed as threatened under the ESA, and so we need to implement those biological opinions related to those shark species.

Then, internally, we are actively reviewing the entire fishery, to see what we can do, what areas of concern are there in the fishery, and there is quite a few, but, also, what areas have we succeeded in doing, such as what stocks have rebuilt, and then where can we go? What future rulemaking should we focus on?

Related to the status of the commercial shark fishery, from 2014 to 2019, we have seen a decline in active permit holders, a decline in the number of trips, a decline in the landings per trip, and we see that, really, only a small number of shark fishermen account for most of the landings.

This shows you some of the information that we've seen so far, and that's the commercial permits, and the graphs on the right -- You have the year on the bottom, 2014 to 2019, and then the number of permits on the Y-axis, and so, as you can see, the top line is our shark directed permit holders, and it's a 41 percent decline in active permit holders, and, if you go down to the bottom, that black line are the inactive permit holders for all of our directed and incidental permit holders, and that has been increasing over time. This is showing the commercial trips, and these have also been declining, and these include any trips that had any shark landings, and it is split out by permit type, but you can see that there has been a decline in the Atlantic and in the Gulf.

This is commercial landings, and this is showing all of the commercial landings by management group, and you can see the decline there. On the left-hand side, we have the table showing the management group with the top-three species, or the top couple of species. As you can see, those species actually are not -- Well, except for mako, they're not overfished, and so blacktip through spinner. They're actually pretty healthy for blacktip, and unknown for bull and spinner, and mako is overfished, and thresher is unknown. Sharpnose, finetooth, and smooth dogfish are all healthy stocks.

This is the recreational fishery, and there's just one slide on this one. Generally, the number of permit holders with a shark endorsement didn't change from 2018 to 2020. The shark endorsement was first required in 2018, and the number of years with directed shark trips has -- The number of directed shark trips has declined in the past six years, and smoothhound, sharpnose, and bonnethead are the most caught species recreationally, but also keep in mind that most sharks caught recreationally are released, and a lot of those are not identified to species.

When it comes to shark depredation, we are wondering what factors we should consider, and so I would really appreciate thoughts on that. We are making some progress in looking at shark depredation. Marcus Drymon has developed a genetic ability to be able to swab the depredated fish and figure out what species of shark actually was the culprit, and we have also looked at some of the observer data in the pelagic longline and Gulf reef fish fisheries and found some interesting results, such as with pelagic longline. While it has much higher rates of depredation, that has been fairly stable over time, whereas, with the Gulf reef fish, the rate of depredation is increasing over time.

Just, in conclusion, we are very much aware of this issue, and we are working on it and trying to figure out the extent of the problem and what species are involved, so we can help figure out a solution. We need a lot more data for this, and we have identified depredation as a research priority, but we also need to keep in mind that shark management, just like all the management for the species you all manage -- We are bound by Magnuson-Stevens, and so we need to rebuild overfished stocks, and we cannot permit overfishing, and we need to find ways to ensure that optimum yield is attained. If you have questions or suggestions, I am here to listen and answer anything that I can. Thank you.

MR. HULL: Thank you very much, Karyl. I can start this off myself, and I am a commercial shark fisherman, and one of the things that has been very helpful for me to promote the product to

the general public has been NOAA has, and I believe it was last year, or even further back, but they actually have promoted domestically-harvested shark under our fishery management plans as a sustainable good seafood choice.

There has been so much negative information about shark populations that are going extinct around the world, but they never distinguish between where that is in the world or whether it's domestically-caught product, which is sustainably managed with fishery management plans to rebuild them when they are depleted, like we have. I found that be very helpful, and I have a fish market, and a restaurant also, and we have that flyer out, and people ask questions, and I think, if you can do more of that, and get the general public, not just in coastal areas, but we used to have a shark meat -- It was a meat fishery forever, and to get the rest of the country onboard and get it back in supermarkets, and then we can start fishing some more and maybe help thin some of these populations out, especially in areas where there is a lot of depredation with a lot of effort on the water.

My experience here off of northeast Florida is I have never seen as many sharks of all species as I'm seeing now, and, as you know, sharks eat sharks, and, where there is one species in abundance, the others are in abundance, as least as large coastals and small coastals that we catch, especially -- Obviously, just to speak quickly, there's nothing we can do about it here, but the science -- You know, it's real late, being caught up with the reality on the water, and I know you don't have the science set up to do quicker stock assessments on all these different species, and you need to know what's going on, but we need to try to improve that, if we can, or do something a little different, because blacknose, for instance, on the Atlantic, you're showing them as being overfished and overfishing occurring.

Well, if you come fishing with me, you may have a different opinion of that, and so thank you for that, and I am going to leave it at that for me and move on to some of the other AP members. Thank you.

MS. BREWSTER-GEISZ: Thank you so much, Jimmy. I very much appreciate that, and, yes, we have been trying to very hard to promote the shark fishery and put more information up on our webpage talking about how sustainably managed they are. In regard to the SEDAR and the stock assessment process, I agree, and I wish we could get it faster, but, as this council is very much aware, there are limited scientists and limited time to get stock assessments done.

MR. HULL: Yes, ma'am. Thank you. Okay. Andrew Mahoney, you're up.

MR. MAHONEY: With the graph that showed the stock assessments, in the time that it was higher than the sustainable level -- I mean, I don't think that I was even around then, but was the depredation an issue? I mean, I guess some of the older fishermen can answer that, but, when it was so much higher of a population, were they seeing the same things that we see now as fishermen? That's all.

MS. BREWSTER-GEISZ: I wasn't around back then either, and my understanding, just as what Jimmy said, is a lot of the fishermen have never seen anything like what they're seeing now. There is some indication that sharks are learning the sound of the motors, and it's like a dinner bell, similar to what marine mammals are doing, and so there might be some of that, and there is also

indication that shark feeding helps attract sharks, and, again, helps teach them and reinforce the sound of the boat motor, but we really don't know yet.

MR. HULL: Andrew, as an old guy, I can chime in and tell you that we always had some shark depredation, obviously, but I don't think it was ever -- That it got much past dock-talk, or talking on the radio to each other, and now, with the new world of communication and phones and apps and on and on, I think it's being reported more also, along with the increased depredation, and so it's a double-header, in my opinion. Harry Morales, you're up.

MR. MORALES: Yes, sir. Thank you, Jimmy. I am not a shark fisherman. However, in the Hilton Head area, you're going to find it extremely difficult, many times that you're on the water, to avoid the sharks, whether you're cobia fishing or -- You know, I was in a kingfish tournament, and both times that we were out, and, of course, we were also chumming, and so, along with the kingfish, we were catching our fair number of sharks, and some of them -- The biggest one was probably about twelve feet. That does take up quite a bit of time, but I don't know. Of course, up by us, nobody has an interest in keeping them, Jimmy, and I think it's the bad rap, right? I mean, I was told that they're not good eating, and so why would I bother to bring them in? I might reconsider that.

MR. HULL: Thank you, Harry. I appreciate it. Andrew Fish, you're up.

MR. FISH: Looking at that graph there on the page we're on, I would just like to offer my history, and I started diving our ninety-foot reefs in the early 1980s, and I was a teenager, but I can remember never seeing a shark, ever, and, up until the early 1990s, we still never saw sharks, and, nowadays, it's very uncommon to not see a shark off of Canaveral in our ninety-foot reefs, and it gets even worse as you go deeper.

Our king fishery, our hook-and-line guys have trouble catching king mackerel in our seventy-foot reefs when the kingfish are actually thick, and the sandbars are actually following these schools of fish, and it is very, very bad right now on all species, especially amberjack, grouper, and king mackerel, as our shark predation. I'm just offering that. Thanks.

MR. HULL: Thank you, Andrew. I agree. Red Munden, you're up.

MR. MUNDEN: Thank you, Mr. Chairman. Karyl, for a number of years, I represented North Carolina Marine Fisheries on the Mid-Atlantic Fishery Management Council. During that time, I was very involved with the development of the spiny dogfish fishery management plan, but I noticed that you've got smooth dogfish listed under the small coastal, but you don't have spiny dogfish. Are they not included in the small coastal shark grouping?

MS. BREWSTER-GEISZ: Spiny dogfish are managed by the Mid-Atlantic and New England Councils, and so the only species listed here are species managed by Highly Migratory.

MR. MUNDEN: What's the current status of spiny dogfish, if you don't mind?

MS. BREWSTER-GEISZ: I believe they are healthy.

MR. MUNDEN: That's what I thought. Thank you very much.

MS. BREWSTER-GEISZ: You're welcome.

MR. HULL: David Moss, you're up.

MR. MOSS: Thank you, Jimmy. To reference something that was said just a couple of speakers ago, and forgive me, and I don't remember exactly who said it, but, in talking about what looks like anyway the indices of abundance and the stocks being lower than they're usually been, but we're seeing more predation, and I heard -- I think it was Clay Porch, Dr. Clay Porch, say, not too long ago, that the science is telling us that there's not more sharks than we've ever had, but it seems as though exactly what was just said, that they're hearing the dinner bell when they hear all these boats out there, and with all the chumming, and with the shark feeding scenarios and things like that. I don't know what it is that we can do about that, but I've heard that on more than one occasion, and obviously we certainly need more data and science to see if we can prove that.

The other thing that I would say, and if the stocks are actually up, and this speaks to how powerful public information can be. If you look at something like the sailfish stocks off of the South Atlantic, and, for a long time, it was completely okay to bring every sailfish that you caught to the dock and put them up on the board, and then, when peer pressure got to the point where everybody was saying, look, you're not going to eat these anyway, and they're not very good tasting, blah, blah, blah, people stopped doing it, and now, of course, we have a tremendous sail fishery off of south Florida, and the same can be done with virtually any species if our message is correct.

You don't absolutely have to bring every single thing that hits your deck, and as a recreational fisherman I'm speaking, and you don't have to bring every single thing that hits your deck back home. It's okay to leave some fish for tomorrow, and we see how quickly and easily a lot of these stocks can rebound when we manage it correctly and our message and peer pressure is where it needs to be and what it needs to be.

MR. HULL: Thank you for that. Randy McKinley, you're up.

MR. MCKINLEY: Thank you, Jimmy. Just a couple of observations. I mean, I've been fishing since the late 1960s and the 1970s and the 1980s, and the sharks just weren't a problem then. You know, you just wonder about the stock assessment on some of these species, and I know it sounds pretty harsh, but a quick way to find out what sharks are doing what is a short-term bounty or an incentive to take some of these sharks that are eating these fish, and then maybe have some kind of tagging program that would see if they're just trained sharks or if it's just a big population, but I know, in talking to some of the commercial divers, it's a pure nightmare story, I mean what they're seeing.

They're seeing these giant schools, and that just didn't happen years ago, and so I don't know. Either they shifted or something, but there is a lot more sharks where we fish than there used to be, and now you've got to be right on the rocks to catch grouper and stuff, and you can't be off. They just -- I think any grouper that used to go off the rocks have been eaten up, and, if there's a lot bigger population, those things never stop eating, and so they're just going to -- It could become a problem that we can't overcome, or it may be too late to help. Anyway, that's my observations.

MR. HULL: Thank you, Randy. Tony Constant.

MR. CONSTANT: Jimmy, I agree with you. I have fished a good bit around northeast Florida, in your neck of the woods. From Mayport to Amelia Island, there's more sharks than I have seen in a long, long time. Up here, between Edisto and Savannah, we have a whole lot of sharks as well, and, you know, I think some of the reporting, maybe what we've been talking about off and on through this last couple of days -- You know, there's a lot of money out there nowadays, and everybody is driving a go-fast boat with two or three engines on it, and you couple that with the social media, and you get a lot of depredation reporting. A lot of folks haven't been fishing on the saltwater, and so it's a big shock to them when they see this depredation happening.

I'm fifty-nine years old, and I've been fishing in the salt since I was old enough to hold a 4/0 reel up and reel it, and I can say I've seen depredation all my life, and I guess all of us have, and I honestly don't think I can say that I have seen more of it in recent years, although, to what somebody said a minute ago, you sure can't let a grouper sit down there in the water for a couple of minutes, or he'll be gone. If you hook a bottom fish now, you better get him up, but, that said, I was always taught to do that anyway, or you were going to lose him. I really do think that a lot of this reporting is probably because we have a lot of new fishermen out there, and we have a lot of phones in everybody's hands, and so that ends up getting reported more and more and more, but it sure isn't any less. That's all. Thanks.

MR. HULL: Thanks for those great comments, Tony. Rusty Hudson, you're up.

MR. HUDSON: Good morning. Karyl, it's good to hear your voice again. It's been two years now that we started on the Atlantic blacktip assessment. By the middle of December, the complete report should be available, and I'm assuming that, at our spring meeting, we'll be discussing the results and the projections and the potential quotas for Atlantic blacktip, but keep in mind that, in our state waters of Florida, since 1992, we have not been allowed to use a longline, and since 1994, I believe, was when the -- Maybe 1995, but when the gillnet for shark was also precluded from the state waters.

The blacktip population, as we saw in all the various runs yesterday, is apparently very healthy, with not overfished and overfishing not occurring, and that's a good thing. The situation with the sandbar shark is, because we did that standard assessment, we truncated the range, and the overwintering aspect of the adult sandbars in Mexico, and it's true also with the adult dusky sharks overwintering in Mexico, makes it so that, in the late winter and early spring, particularly during the breeding season between male and female sandbars, they come up the east coast of Florida, since I'm only going to refer to the east coast, via Mexico and the straits of Florida, and the sandbar shark population appears to be way ahead of what the science said.

Because it didn't actually, and also with the dusky, look at the complete range of these animals that are genetically connected to each other, that continues to be a problem, and, you know, it almost begs for sandbar and dusky to be reassessed to understand what's going on. The depredation from sandbar is quite real, and I personally experienced it, and I'm now sixty-five, but, when I was nine years old, in 1964, and through the 1960s, just party fishing, being a bait boy and a second mate and a first mate and later a captain, but all of that time, back in the 1960s, we had depredation, particularly from sandbars, because the blacktips don't get out, generally, to our reefs offshore. It's mostly sandbar, and then, further off, out by the big ledge, it's the dusky, off of Florida.



Now, of course, we know the nursery grounds are up there in the Mid-Atlantic, North Carolina through Virginia and Delaware and those bays, and that's been an important feature too, in how we've been able to reduce the take of the pups, and, of course, in year-one, for all these pups, usually the greatest depredation comes from bigger sharks of other species, and then, once they get to a certain age, they start migrating, instead of staying in their nursery areas and moving in and out based on water temperatures and time of the year.

We know that the sandbar fishery is potentially very healthy, but it's a research fishery, which means that, until the stock status changes by a new assessment for sandbar, we are not allowed to take sandbar without an observer on the boat. Now, as you know, the Narragansett independent survey, longline, has concentrated mostly in the regions offshore of state waters and inshore of forty fathoms, and they wind up seeing a huge increase in the number of sandbar over the last numerous surveys, but those surveys normally are two and three years apart.

Of course, the people like Lisa and Nancy have retired, just in this past year, and so we've lost a lot of institutional knowledge, and, when we're dealing with the survey, you can see that exponential increase of the sandbar shark, and it is very significant, and that's the type of things that are positive, but, until the stock assessment shows that overfishing has been stopped and the overfished status has gone away, and then you have a healthy stock, we're kind of constrained. You're constrained, and we're constrained, and that makes it very difficult for the people on the water, because we can't get timely science, and we can't get the funding for the science, and we can't do a lot of stuff, and that's terrible.

Smoothhounds are fine, and Atlantic sharpnose are fine. Just like Jimmy said, we're seeing the biggest blacknose that we've seen, and yet I've been told that it will be 2024 before they can go whatever with blacknose, and even still, with what's gone on in 2020, turning us all upside down, it looks like the delays are going to be even further into the future, and so we have an opportunity, but it's got to have science behind it, and that's the way the rules are written, and the 2006 Magnuson put a lot of that in place.

I can talk at length, but I am supposing that -- Let's just stay with the Atlantic blacktip, and there is folks up the line that can fish in their state waters commercially for them, and, of course, a lot of people like catching blacktips in the recreational thing, just like the spinners, because it's sometimes a good battle, and they might mix up right there with the tarpons and stuff, nearshore, two or three miles off.

When I was running my shrimp boat in the 1980s, I would have them tear my gear up, and that was a problem. Usually it would be the blacktips, right there two or three miles off the beach. When we get an easterly flow, the blacktips will get outside of the Florida state waters, out to six and nine miles, but, as a general rule, they follow the fish, and they are very good at feeding them, and so it's just like sandbars are, and so we're in need of better, faster science.

I honestly can tell you that the multi-thousands of sandbars and duskies that come through in the late winter and early spring, particularly off the east coast of Florida and as they're moving north, all the way up there and dump their pups in these areas off of North Carolina and Virginia, and then they turn around, and they start working their way back, usually after the full moon of

September, so that, by the time they get down on this end, they have been pecking their way all the way to Mexico again.

There's a lot that we -- The Mexicans haven't even come to the table, and that's what is really sad too, and so I can go on and on, but I don't want to. I just want to be sure that we can get this Atlantic blacktip in place as soon as possible, and we need to be talking to the State of Florida about some kind of way to do a little bit of fishing, commercially, even if it's like North Carolina shoreline, and maybe you can expand on that, as to how they regulate that, but, again, the hammerhead -- Our hammerhead, scalloped hammerhead, is not overfished, or I should say it's not in a problem, like the Caribbean genetic stock.

That being said, that linkage, with your Amendment 14, needs to go away, and it really does, and on both coasts, the Gulf coast and the Atlantic coast, and that would make things a little bit more palatable, and then the guys can go ahead and maybe fill their quotas, instead of leaving a lot of quota on the table, as has happened in the past, but you're right that we have lost a lot of fishermen, a lot of it because of the fact that we're virtually a dayboat fishery, and, here recently, with the problems that have been going on in Hong Kong and stuff like that, with regard to shark fin sales, we're just about totally a shark meat market, and shark is very good to eat if you bleed it correctly and handle it correctly, and these dayboat guys are doing that, and then, that way, they can turn around and have a very good product.

Jimmy can tell you how he's been running blacktip and blacknose through his restaurants, and he has different methods for making it extremely palatable to them, and the people love it, and so a lot to do, and a lot to talk about, but hopefully you all can get the spring meeting, and Randy Blankenship and everybody can get the spring meeting, earlier than later for next year, and hopefully you all get the survey ship out of Narragansett and get it started at Fort Pierce, as usual, and work its way back up above North Carolina. Thank you very much.

MR. HULL: Thank you, Rusty. Robert Lorenz, you're up.

MR. LORENZ: Karyl, I live in southeastern North Carolina, and so Wilmington, and I'm right behind essentially Wrightsville Beach, and I fish mostly out of Carolina Beach, and a little further south. I have been an avid saltwater sportsman now ever since I had a -- Since I got my driver's license, and so I have now crossed my half-decade of doing it, and one of my fascinations was with sharks, and, over the years, I have met other people with fascinations with it, and I am very confused by what goes on with the sharks.

I feel for those of you trying to solve this, because it's been my experience in the -- I would be, in the 1970s, early 1970s, catching blacktip spinners from the surf, or maybe it was blacktips, off of Melbourne Beach, and it wouldn't be unusual to get a surfing friend to take me out on a board and all, and this is in the middle of the day, and they were basically around at certain times, and it was a lot of fun.

I don't know what has happened to them since then, but I am hearing that they're here, and mako sharks -- Mako used to be around pretty much, and I have a trophy plaque here in my house, and I placed third in a mako tournament, and it was out of Cape May, New Jersey, and that was a 288-pound fish. The winner was over 540, and so, basically, where I'm coming from is I understand there are some very large sharks that I think have been under some type of extreme pressure, and

what I can see is that management going forward is going to get difficult, because there's become a fascination also with the general public, and this would be more of an issue than with the fishermen, anyone that wants to use it as a commercial food source, and they're becoming almost as fascinated with sharks as they are with turtles, and so we'll have that conservation push always with us.

As the mako, I've seen a decline. Living here in North Carolina, southeastern North Carolina, and fishing the past twenty years, I was surprised to see your relative biomass on the small coastal sharks with what it showed for the sharpnose, and so I can imagine the kind of anecdotal input that comes in there, before, for a number of years on this AP, I have always been speaking at what a pain the Atlantic sharpnose is, and so, having not fished here prior to the year 2000, off this coast, I am shocked at where the biomass is or what it must have been, because I have watched the life history of this particular one locally, and it literally became like an invasive species, and Rusty talked about the pupping and that sort of a thing.

Back about eighteen years ago, there were little pups all over, and I guess the females must have left and just dropped them along the beaches, and, over the years, those sharpnose have grown, from not just the surf zone, to, regularly, many four-foot twenty-pounders out where we fish for snapper grouper, twenty miles out, and so I find that biomass low. With that, I will end with one question just to think about things we could possibly do, and I presume the biomass studies you do -- Is this like an entire basin, and this wouldn't just be -- Is it broken down any to the South Atlantic or the Gulf? When you present this kind of data, is this trying to guess, or extrapolate, what the entire population is over the ocean, and then, for some of these -- Some of us must be experiencing phenomenal center of abundance, and is there data, or a need for data, on centers of abundance?

It would tend to think that we must have one here in southeastern North Carolina for the sharpnose, and I was just wondering if that slides into management of the species, talking about the biology, and could there be species where, maybe for the sharpnose -- I don't know where it all goes, but is the abundance of them that we have here necessary for the entire population? In other words, does that mass of fish that we have right here off of Wilmington, does that mean anything to the Gulf? What I am trying to think of and get going is are there some species that could, in certain spots, be tapped more for commercial value, or are the controls going to be planned and based strictly on the biomass of the large basin, the entire ocean? Thank you.

MS. BREWSTER-GEISZ: If I understand your questions, you are asking specifically for sharpnose, but I think, more generally, about the range of the stock assessments.

MR. LORENZ: That's correct. My point is are there regions of abundance, and is there any management opportunity regionally, because, again, you get into climate change and all, and there would be areas where species could get very abundant, and maybe they don't interact with another region, and so why couldn't you fish harder for some of those in certain areas?

MS. BREWSTER-GEISZ: Right, and so all of these species have different ranges, depending upon -- A lot of it is on the temperature, but the habitat as well, and Rusty talked about sandbar going from Mexico all the way up to North Carolina and Virginia, where they pup and go down, and, in recent years, we've seen blacktip go a lot farther north than they used to.

Specific to sharpnose, what we see here is the graph of the entire population, but the last assessment that looked at sharpnose determined that they really need to be split between the Gulf and the Atlantic, and so we have done that for management purposes, and looked at that population split, but we really need to do a full stock assessment to get an idea of what the Atlantic population is doing, versus the Gulf population. They are very popular species recreationally, and so they are caught a lot.

Our small coastal quota for any of the small coastals, blacknose and sharpnose and bonnethead and finetooth, has not been landed, except for Atlantic blacknose, once we declared them overfished, and that species-specific quota has been landed a couple of times, but not recently. When you talk about species like shortfin mako, that you mentioned as well, that population is for the entire Atlantic, and so it is assessed internationally and not just for the U.S., and so, when you start talking about ranges and species, it really is specific to that species.

Yes, there are some areas that appear to have good markets, and others that don't, and I'm going to use smooth dogfish as an example, where there is a very active and good local meat market for smooth dogfish in the Mid-Atlantic. The Gulf of Mexico has three species of smoothhounds, smooth dogfish, Florida smoothhound, and Gulf of Mexico smoothhound, and they do not have a fishery at all for those species, even though it's the same fish, when it comes to smooth dogfish, and so there's a lot in what I just said and in your comment, and I will leave it there, and I just appreciate the comment.

MR. LORENZ: Thank you. I'm very happy to hear what I would say is a little more confinement to the basin, and like, for instance, sharpnose being Atlantic, and my thoughts are just trying to help some of these people who are looking for other opportunities to fish, and I guess, for like us on the AP, or those that I will call it complain about the sharks, we need to laser-focus more on a species and try to provide our logic and argument for why we think that species may be better utilized, and some of them, as you said, are a worldwide specimen, versus what looks like you might be going to a little more localized assessment in the ocean basins, and I'm happy to see that. I think there is opportunity for some of us try to think of these things for how to get more opportunities on some species. Thank you.

MR. HULL: Thanks a lot, Bob. I can tell you that Atlantic sharpnose, puppy sharks, we have a massive quota available in the Atlantic, and, since we -- There is quote linkages with blacknose, and, since we put a trip limit on the blacknose interaction on those trips, it hasn't shut down, and so there's plenty of opportunity in the small coastals, with some management changes there on these linkages, which it looks like, in that Amendment 14, which I haven't gotten into much, but it looks like there is maybe some more opportunities to do something with these linkages, which we have had Atlantic sharpnose shut down, with leaving metrics tons available, but it couldn't be caught, because of the quota linkages, but that's just on that small coastal complex. James Paskiewicz, you're up.

MS. PASKIEWICZ: Thanks, Jimmy. You know, I'm a commercial fisherman in the Florida Keys, and we've seen shark depredation on the rise for many, many years, and one of the questions that I might ask about the shark stocks is, is there any areas where these sharks typically would be historically that they're not anymore, that we're not seeing any of these species? Are there large areas of the Atlantic Ocean that are shark free?

Maybe we could understand more about the dinner bell concept, and there are so many more boats on the water, each and every day, and I hear so many stories about boaters right next to each other that are fishing the same rocks for the same fish, and everybody on that rock has sharks swarming the fish that they have hooked up. One or two miles down the reef, sharks. Five miles down the reef, sharks. They are up and down, Key Largo to Key West, and we have plenty of sharks.

I wonder, if we are just ringing the dinner bell for these animals, then, if they're concentrated where they could easily feed, where are they absent, and are we seeing that? Is there any science to support that, because, if there isn't, then I would have to agree with Rusty that we are way late here on getting an accurate representation of where these stocks really are with some of these species, and we've got to do better, and that's it for me, Jimmy.

MS. BREWSTER-GEISZ: Thank you for that. There is evidence that species that had ranges being reduced as a result of overfishing are now starting to go back into their more normal fishing prey areas. The first example that jumps to mind isn't necessarily related to your area, but think of white sharks, where we are now seeing them off the Cape, and we hadn't seen them there for years, and now they're back in abundance, and so we are seeing that with more than just white sharks, but that's the species that comes to mind, and so it is a good point, and it's something that I will make note of to go back and look for some of our other species as well.

MR. HULL: Thank you, Karyl. Tony Constant, you're up.

MR. CONSTANT: I'm going to have to agree with Rusty on one thing. The sharpnose and the blacktips are like gnats here in southern South Carolina, and, when they start, you can't get them away from you, and they're filling up the shrimp nets and so forth, but what I wanted to more talk about was, in July, in this area between Edisto and Savannah, we had a huge influx of a good tarpon fishery, and it's not like south Florida, where you can sight fish them there, but there was a whole lot of abundance of big fish.

Well, the big hammerheads tend to come into the sounds, basically around the beaches and the mouth of the sounds, after these tarpon, and they eat a lot of them, and it's quite the show sometimes, but what in recent times has been showing up in big numbers, or bigger numbers, are great whites, and this kind of goes with what James was saying of are the sharks not there anymore.

Well, I didn't grow up around great whites, or at least I didn't think that I did, and the great whites are eating the tarpon, as well as the big bull red schools that are offshore. I mean, it's a perfect food source. You've got a lot of big, meaty, slow animals that don't -- They're not like a tuna that is going to run at a high speed for quite some time from the shark. They're going to take short bursts into their schools, and these big sharks can just go through and have an incredible meal.

There has been a few charter guys that have made an industry out of this, and they're tagging them, satellite tagging them, which continues to show more and more in the area, and have you all -- I'm assuming that the great whites must be managed in the mid-Atlantic and upper Atlantic, being that I haven't been around them much in my life, and I've grown up in the south, but is this something that has become more of the norm? Are you seeing great whites migrate more in the south?

MS. BREWSTER-GEISZ: Thanks for that. There is a lot of evidence that great whites are found in the south, and fairly close to shore, up along Florida and going up into the Carolinas, and the

charter boat fishermen -- Some of them are figuring out how to go out and target great whites, which, even though whites have been prohibited since 1995, or 1996 maybe, they are allowed to be targeted. They are the one prohibited species that can be targeted and caught, but they just can't be retained, and, yes, that appears to be making a comeback, which is good. They have been doing that for a number of years up in New England, and now also off of the Carolinas.

MR. CONSTANT: You know something? We do see sharks eat sharks, and we do have some very large hammerheads in this area. I mean, ten to twelve foot is not uncommon at all, and I've got a friend who is retired DNR, and, after Hugo came through, one of his chores was to assess the coastline and the South Edisto River, because of the flood waters that were dumping all the debris out, and he said there must have been thousands of thousand-pound hammerhead, which are ten-foot-plus, which is very common, and I just wonder how the great whites are going to affect the population, if sharks eat sharks as well, but that's good information.

MR. HULL: Thank you for that. I usually have several great white encounters every year on my gear off of northeast Florida, and that didn't used to be that way, but it's that way now.

MR. CONSTANT: That's what I see too, and you're right next door.

MR. HULL: Yes. Jack Cox, you're up.

MR. COX: I just wanted to tell Rusty thank you, because he is our shark expert, and, man, I've learned a lot over the years listening to Rusty talk, and I appreciate all the hard work he does for our sharks, and he kind of represents a lot of us that don't have the knowledge that he's got, but thank you, Rusty, for the hard work and what you do for us at the different meetings you go to, but I have just got to say, here in North Carolina, we are just seeing so many more sandbars.

When I was on the council, we just listened to the fishermen that came to public comment, and it seemed like almost every other fisherman was saying please help us, and let's do something with the sharks, and, growing up in the 1980s and 1990s, we had a really healthy shark fishery here in North Carolina, and, of course, that's been cut completely out, and there's no way, really, to do eco-fisheries management without harvesting fish like sharks, and that's going to be the only way, in my opinion, that we're going to be able to kind of get the ecosystem back in check, and I don't know, and it probably will never happen in my lifetime, but fishermen just come, and they talk, and they make comment on it, and that's the only way that I see that we could build it back.

Jimmy, people like you that are serving the public shark, that's a great thing, because it is a good protein, and it takes some of the pressure off these other species that we're targeting and we're having some problems with, but I did want to ask -- I did want to ask the presenter about the sand tigers. We don't hear anything at all about sand tigers, and I do a lot of spearfishing, diving, or I used to, but we're seeing so many sand tigers, and I don't know if other folks are, but especially on every one of the wrecks. We have as many wrecks in North Carolina as I think anybody up and down the coast, and every wreck is just populated with hundreds of these things, and some of them are 500 or 600 pounds apiece, and could you comment just a little bit about the sand tigers, please?

MS. BREWSTER-GEISZ: Sure. Sand tiger sharks, as with whites, have been prohibited since the mid-1990s. They are an interesting species, in that they only have two pups at a time, because

all the other pups are eaten in utero, and so that is why they were prohibited, because they are so slow -- The population is so slow to rebuild, and so they are still prohibited. They were never really a species that was caught a lot commercially, or at least not that I remember seeing in the landings data.

They are a species that is caught a lot for public display, and so, if you go to aquariums, and they are apparently very easy to keep in aquariums, because we end up issuing a lot of permits for aquariums to collect them, but we do not, at this point, have any plans for a stock assessment for them, as they are not one of the species that people seem to want to go out and fish for. I am heartened to hear that you're seeing a lot of them, but I do not have a good solution for you on that one.

MR. COX: Okay. Thank you for your comment.

MR. HULL: Rusty Hudson, you are up.

MR. HUDSON: All right. I need to comment on a couple of things. First, the Atlantic sharpnose, we lovingly refer to them as the mice of the sea, and they are, and have been for decades, the mice of the sea. On my headboats, back in the 1980s, that I was running, we would get into them so thick that we couldn't catch anything else, and I would limit the people to three sharpnose apiece, forty people onboard, sixty people onboard, whatever.

That way, I could ensure being able to do the fish cleaning and utilize the product, because I hate wasting anything, when it comes to feeding people, and, of course, sharpnose were not overfished, and overfishing was not occurring, but, just like Jimmy pointed out, we had that linkage with the blacknose up until they divided it into different areas on the Atlantic coast here, and, yes, it would only take a gillnet guy a couple of stabs on the blacknose, when they were thick off of Florida, and it would cause the entire small coastal shark complex to be shut down for the rest of the year.

We got past that, to some degree, and, likewise, the great whites. Yes, they found some of the great white pups resuming their nursery in Long Island Sound, and so they have cleaned up a lot of the pollution up there, but the focus of the great whites up on that end are marine mammals, and, in particular, the seals. Unfortunately, the seal population was assessed only as a U.S. population, and the other part of that same population in Canadian waters wasn't considered, and it's going to be considered now. Then they will have a better idea of what removals of the seals that they can make that these great whites are feeding on.

Don't forget that our right whales are also in decline, and, each season, the right whales work their way from up there all the way down to Florida, where we have all these rules to protect both the calf and the mother and whatever, and very rarely do these right whales get into the Gulf of Mexico. It has happened. About every decade or so, you might get one mother and a calf or something go over some place, as far as Texas, and then come back.

Again, the great whites that have been caught down this way, and I have to say the great white and the sand tiger and the whale shark and the basking shark in the deepwater, and the bigeye sand tiger, all five of those were prohibited in 1997. It was mostly because of the charismatic nature of them and the lookalike with regards to that deepwater sand tiger, but the sand tiger has a really curious really nice set of jaws, just like a great white does.

That sand tiger, unfortunately, and it's an ancient type of shark. When you're trying to dress that rascal, it's got hard cartilage between muscle membranes that you don't see with other sharks, and so that makes it a little bit of a problem, and, like Karyl noted, the cannibalism that occurs amongst the pups inside the mother, and then the two that are born, and then, from there, Jack Cox has shown me footage of hundreds of sand tigers, and several years ago this footage was taken by some of his divers and stuff.

Yes, they sit around on all these great no-fishing areas, and they're doing very well for themselves, but that was a normal area for them in larger populations, but, down our way -- Of course, the shark fin value on a sand tiger is like low to medium-grade value, because it just doesn't have the yield of the whatever that they make the soup from.

With the great whites, Bob Hueter, who has been at Mote and is about to retire, and he's the chief scientist for the research, and they just had the largest tagged female, at seventeen foot, they've ever had earlier this year, just a month or so ago, as well as they always tag these great whites, but, one time, they caught a nice great white off of Jacksonville Beach, 200 yards off, and that just shows you how close they can get.

I know Jimmy has told me stories of being three miles off, just pulling his gear, and a big old fourteen or fifteen-foot great white pops up, being interested in depredating whatever he's got on his line, which occurs, because the bigger sharks like eating the smaller ones, and I heard about the Edisto Island stuff, and the great hammerhead gets to be fifteen or twenty foot, and it weighs a lot, but, if you get into the scalloped hammerhead, which is the animals that we're trying to protect and we have to report to CITES every year, and we can't sell or ship any of them outside of the United States without having a proper record, catch record, from the boat to the wholesaler to every place it goes and winds up, which is a good rule.

We have just gotten all that in place in recent years, but, again, we're experiencing a huge increase in our shark populations that are shared internationally, in a lot of cases, whether it's with Canada, whether it's with the high-sea fleets, and the shortfin mako has obviously got problems, based on what the northern population shows. The Mediterranean is a different critter on the shortfin mako. In the South Atlantic, they couldn't get the results, and, I mean, there's so much data issues, at times.

They have been using size limits, and the males, of course, are smaller than the females, in general, and so there is adjustments they're trying to make at a management level, but we have the same problem again of science. Until the science is there, and until it's reliable and reflects the reality of what's in the ocean, we're going to continue to have these problems for years and years to come, and all of the efforts that we're making with our snapper grouper and mackerel and other types of the billfish and everything else that we're trying to rebuild and stabilize populations, they're all being threatened by exploding shark populations, and people are going to have to come up with a little better solution.

Part of the solution is feeding people. You know, I had that kid that died, Rod Stewart, in the *Sharkwater Extinction* movie that he was filming, and I had to convince him of the reality that we weren't throwing our sharks away and finning them, because it's against the law, and I had to convince him of the reality that we weren't funneling all these sharks into the cat food market, and



we were instead feeding people, and this is something that I finally got it through to him, after three hours of filming and stuff, and then, a week later, he drowns.

There is all these kinds of scenarios that we have encountered where people are saying that our sharks are going extinct here in the U.S., and we've got to ban finning, and we've got to ban all take of sharks, so that they can get back to the normal population that they're supposed to be, and that's, again, a reflection of science that isn't adequately showing what we see and what we know that we saw, and what we're going to be seeing in the future is not going to be good for our rebuilding plans.

The good upside is that our red snapper has also exploded, and so we're a predator-rich environment, and that's just the way we're going to have to live with it until we have a way to catch a few more red snappers and a few more sharks and do whatever it takes, and so thank you, Karyl, for everything, and I will see you -- I hope we'll have a meeting eventually next year.

MS. BREWSTER-GEISZ: Thank you, Rusty. I also hope to see you at the meeting next year. If not, we'll see each other at some point. Also, thank you, and I agree that we need to feed more people sharks, and I think sharks taste great. I wanted to share a little bit that I didn't share during the presentation, but our shark quotas this year are not anywhere close to being landed, and so, if you remember the aggregated large coastal, at the beginning of October, only 32 percent of that quota has been reached, just to give you a sense of how much of a decline it was, and, a couple of years ago, that quota would have been -- We would have already had to shut down.

MR. HUDSON: But, Karyl, we also have a couple of problems relevant to this, and, I mean, we don't have the observers for the sandbar research fishery, and we don't have the independent surveys going out this year. We've got survey problems with MARMAP and other stuff too occurring that normally monitors our fish, and so that's a little bit of a problem, and I'm just kind of wondering what's these big holes in the data going to cause us when we do get to doing the science, and so it's a little bit of a problem, but, Karyl, you and I have known each other since at least 1998, and we've worked around each other a lot, and you got me involved with the American Elasmobranch Society in 2004, and I have tried my best just to be able to deal with everybody with factual information, because I don't want to put hyperbole out there, and I don't want to put falsehoods out there, and I believe in facts, and so thank you.

MS. BREWSTER-GEISZ: I definitely appreciate that, Rusty, and, yes, the research survey did not happen this year, and it was scheduled to, but, because of COVID. The observers have been able to get out in the research fishery for the Southeast, and our shark research fishery was the first fishery to get observers back out on them, but we have had some changes among the research fishery because of COVID, in terms of participants.

MR. HUDSON: Well, we've also lost our fin market too since last year, for the most part, and so we've got a problem, as far as being able to be economically viable, whether it's sandbar or any of the other aggregate large coastal and small coastal. Thank you.

MS. BREWSTER-GEISZ: Yes. Thank you.

MR. HULL: Thanks to both of you on all that. Again, I can ask that the agency continue to promote shark meat as a viable choice. The more that you can do that for the general public, the

more demand in building a market again, because we're basically building it back again, trying to, and then we can have more effort and obtain and utilize the optimum yield of this resource, and so, the more the agency can do, the better it will be, because we really have taken a big hit from the mass media that has said that everything is overfished, and so thank you for that.

MR. HUDSON: Sustainability, Jimmy. Sustainability is what we are shooting for.

MR. HULL: Yes. Right on. Chris Militello, you're up, sir.

MR. MILITELLO: I just wanted to give you a little intel on the West Palm area. There's definitely, definitely more sharks lately, the last two years. We're seeing it with the bottom fishing, mostly, but, also, like when we shoot over to the Bahamas, in the channel, we would always run into sharks, fishing for tuna, but we went up top, around like Matanilla and stuff, it wasn't terrible, but, like the last year-and-a-half, even off of Matanilla, we're seeing sharks up that way too that we weren't seeing years before, and I just wanted to give you that intel.

MS. BREWSTER-GEISZ: Thank you for that.

MR. HULL: Thank you, Chris. Karyl, I will tell you that -- Well, I have some more. David, you're up.

MR. MOSS: Thank you, Jimmy. This actually isn't for Karyl, really, and it's only kind of directly directed at this particular topic, but, in general, everything that we have said over the last two-and-a-half days, or three days, is better science, better data, so on and so forth, and it's important to remember that all the people collecting this data and science here -- There is only so much they can do with what they have, and it's incumbent upon all of us, not just on this panel, but everywhere, to talk to our elected officials and make sure that money is allocated so that we can get better science and better data, as we all know that we need, and so thank you.

MR. HULL: Thanks, David. Karyl, it's been a really great presentation, and it was very, very educating to all of us. I hope that you will come back to the AP in the future and update us on HMS shark fisheries, and maybe annually we could get you back, because it's really been enjoyable. Thank you very much.

MS. BREWSTER-GEISZ: Thank you, Jimmy. It's been great hearing all the comments and thoughts, and you have raised some good questions that I need to go back and do some more work and figure an answer to, or if we have an answer, and I would be happy to come back at any point, and just ask.

MR. HULL: Thanks again. Myra, it's back to you.

MS. BROUWER: We are to the Other Business part of the meeting, and so, Jimmy, however you want to handle it, and we'll put up the hands raised on the screen, and then this is a chance for folks to bring up other items that they would want the council to discuss or consider, and so we'll go from there.

MR. HULL: Thank you, Myra. I have a couple of people that have contacted me already and that want to bring up some Other Business, and this is the part of the AP meeting where we can go off

the agenda and bring forth some new concerns and ideas and things that we can pursue in the future and talk about, and I need you all to -- Sometimes we can get off into the weeds on these things, and so we are -- It's almost eleven o'clock, and, at twelve o'clock, this meeting will be adjourned, and so we need to get this handled within the next sixty minutes. I am going to go ahead to staff first, Brian, and go ahead, Brian.

DR. CHEUVRONT: Jimmy, this will just take just a minute. As we were ending business yesterday, Rusty made a comment that I responded to, talking about retiring at the end of next month, but one thing we didn't talk about is that my replacement has been chosen, and I think you all will be interested in knowing that Myra Brouwer has been hired to be the next Deputy Director for Management for the South Atlantic Council.

It's a real nice thing, and, I mean, Myra is well qualified to be doing this job, and she's been working for the council for many years, and she has worked hard to get to this point, and I am ecstatic that she was chosen for the position. I know that, during the course of time prior to leading up to the application, she had talked to me a number of times about being interested in it, and so, in going through the process, it was a nationwide search that was put out there, and she came out on top, and so I just am really, really excited that Myra is going to be the one to step in and become the next Deputy Director for Management for the South Atlantic Council.

I am not sure what that's going to mean for the Snapper Grouper AP in the future, and I don't know that anybody knows exactly at this point, but it's a great thing for Myra to have this happen, and I just wanted to share that news with you all, so that you could know and share in Myra's great success and promotion, and this will be taking effect -- I guess, officially, we're going to be sort of tag-teaming for a little over a month or so, but I think, officially, she kind of starts in the position on Monday, and so congratulations, Myra.

MS. BROUWER: Thank you for that, Brian. I really appreciate it, and, yes, thank you to all of you who have been there to support me through all of this time, and I have learned so much from this AP, and I'm confident that we're going to find somebody else to take over leading the AP, but I'm not going anywhere, and so I will still be around, but thank you so much for that. I appreciate it.

MR. HULL: Brian, I would say, from the entire AP, congratulations to you on your career and your retirement, and we're wishing you the best of health and luck, and you have always been -- You have taught me a whole lot and been very helpful to the entire industry, and, of course, to Myra, and thank goodness she's not really going too far away, because we couldn't do much without her. She is the bomb. Congratulations to you, Myra.

MS. BROUWER: Thank you, Jimmy.

MR. HULL: I have, on my list already -- I was first contacted by Andrew Mahoney, and so, Andrew, you are up.

MR. MAHONEY: Thank you. That's pretty cool stuff. I just wanted to see what other AP members thoughts were on the Magnuson-Stevens Act and the lack of addressing a path for new harvesters to enter in the commercial snapper grouper industry and restructuring of the limited-access permits. To my knowledge -- I'm in Beaufort, South Carolina, and I know there's some

other folks that are in the same county as us, and maybe they could add a little bit to it, but, to my knowledge, there is no other commercial hook-and-line fishermen in my county except for me.

Prior to me, there were none. Some charter guys had some permits, and they did some commercial fishing, but nobody was full time, and, since the two-for-one amendment, only one new harvester has gained legality in South Carolina, and that's twenty-five years, and we've had one new fisherman in our state.

My community is suffering because of the limited access program, and, kind of to what Jimmy alluded to yesterday, with that he doesn't like when species are closed down, well, where I live, the commercial industry has been closed for my entire life, and it has to be related to the lack of opportunity for the potential harvesters to gain legality in the industry for our state, and I am just wondering how the other folks attending this meeting would like to address that, and maybe if I can gain some support in making this a priority for the agenda topics for the AP, and that's all.

MR. HULL: Well, Andrew, you can see, on the screen, what has been put up there, and so you mentioned several things, and so I want to get -- Before we go to any other topic, I want to have people chime in on this, and so, for me, I believe we have recommended, as an AP, that the two-for-one be eliminated in the commercial sector, and so that has been done, and we've made that recommendation, and I think that the council has -- They have seen that, and they've talked about it, but nothing has happened for that, as of yet, and so we need to continue to push for that.

I agree with you that we need -- People need to have access to join the fishery and how they do it is -- There's lots of different opinions on what to do and how to do it, and so I would like to hear from some others. Is there someone else that would like to chime in on this?

MR. MAHONEY: One thing I would like to say is that, in my entire life, and I could be the youngest person on this panel, and I'm thirty-eight, and so I guess my life is not as much as some of the people's, but I have never seen a permit for sale, let alone two, and, with the way that it's structured, if you buy one, and a year after it expires, and you haven't got another one to add to that, it's returned back to the original permit holder, and it's just really bad for my community, and it's tough to swallow. That's all.

MR. HULL: I understand what you're saying, and, currently, the only way that you can enter the snapper grouper fishery with an unlimited permit is either by purchasing two or one corporate one or by leasing a permit, and I'm pretty sure that's it.

MR. MAHONEY: Right, and so the deal with the incorporated permit is it has got to keep the federal ID number, and so say you buy a corporate permit out of Florida, and you have to keep that permit registered in Florida, where you can't transfer it into the state that you're from, which leads to interesting stuff with taxes and money going back into your community, really. I mean, this is a natural resource off of our coast that's been totally privatized and anyway.

MR. HULL: I understand, and so I'm going to call hands that are raised, but, if it isn't on this subject, then just say it's not on that subject, and we'll keep your hand up. Andrew Fish.

MR. FISH: My hand, I still want it to be raised, but I will comment on this. It is unfortunate that these permits have gone out of sight on the prices, but, from my understanding, the original intent

of the two-for-one was to reduce the amount of fishing pressure on the commercial side and to get the amount of permits down, so that we can sustain the fishery for the people that have been in the industry that can fish year-round and not have to worry about the closures and the ACLs and that kind of stuff.

With the corporate loophole, it allows many permits to not get reduced, and they could buy the corporate permit and not have to buy the two, and I feel that is a loophole that has not done the intent, which was to reduce the amount of permits, so that fulltime commercial fishermen could fish year-round without worrying about ACLs, and that's all I will say about that.

MR. HULL: Thank you for that. Jack Cox.

MR. COX: Jimmy, I've got a couple of things here, and, first of all, I just wanted to congratulate Brian Chevront for all his hard work, and, Brian, if you're still listening, I think back to our dolphin wahoo presentation and that amendment that we worked on together, and for the black sea bass, and all your hard work, and so just thank you for that all that you've done for our fishery, and I hope you have a great retirement and do all the things that you want to do, and we welcome Myra. Congratulations on your advancement.

Moving on, I just wanted to -- One of the things that I had raised my hand about before we got into this was that I was curious, and maybe Myra can speak on this, but when our next triggerfish assessment is out, and I know that there's some behind-the-scenes grant work going on with some fishermen and scientists, and I think that --

You know, I think that we've got some nasty weather on the horizon for triggerfish, and I'm getting concerned about some things that I'm hearing with discard mortality and the things that have been going on for the last year, and so I don't want to see us end up with triggerfish where we are with red porgy, and I think everybody should put that out in front of them and see what they can do. Triggerfish is very important to our fishery in North Carolina, and I don't know about the rest of the states, but I certainly want to get involved in some citizen science and do what I can to make sure we're getting the correct information that may go into that assessment.

Then I wanted to speak just a little bit here on the two-for-one. I'm fifty-six years old, and I've been in this since I got my very first permit, and I think it went back to 1983 or 1984, and it was a long time ago. Since then, I was -- I worked my way up through the system. When I got that permit, I was working part-time at McDonalds, and I was in high school, and I fished part-time, and I bought two more permits, corporate permits, throughout the years, and so I had three of them.

Then I built a business, a very nice business, Blue Ocean Market, in North Carolina, and we sell our fish kind of like you, Jimmy, to the public, and we kept the snapper boats going, and I bought -- I had three snapper boats and crews. Anyway, I am semi kind of -- I am aging out, and this industry takes its toll on your body, and it hurts you, and so what I've been doing over the last couple of years is training the younger guys to do what I did and try to get them involved in this kind of work that we're doing here this past week.

You know, my heart is in this fishery, and I love it, and I have spent my whole life in it, and I want to see newcomers come into that are able to do it, and I sold one of my corporate permits last year, one of my three, for about what I had in it, and I sold it for \$65,000, and I know that's a lot of

money, but the fisherman that I sold it to -- Three of the fishermen that fish with me, their gross stock in the fishery is around \$200,000 a year, and so \$65,000 to buy a business is not a lot of money. I mean, it is a lot of money, but, when you look at the business world at purchasing a business, and what comes with it, and you have the potential in this business of grossing over \$200,000 a year in a hook-and-line fishery, that's pretty good.

The captains are making about \$50,000 to \$65,000 a year, and so they could pay for that permit in one year, if they fished hard, and most businesses, when you go to business school, it takes about five years to pay a business off, but I am very sensitive to it, because I want to see people be able to access the fishery and get into it.

I've got a twenty-two-year-old mate now that's fishing my boat, and I hope to do the same with him, and he is twenty-two years old, and he's doing a fantastic job, and, right now, I'm leasing the boat and the permit to him and helping him with fishing locations, and I go out and teach him what I know, and I'm trying to keep this thing going, because I'm concerned that the commercial fishery -- We don't have the traditional commercial fishery we used to have, where the boats stay at sea five or six days at a time and come in with all the different species, and, if they have a good trip, they will come in with 2,000 pounds of fish, with a crew of two or three.

I am trying to do my part, but I will say that -- Jimmy, I know we see at odds on this, but I just don't think that our fishery is healthy enough to go to a one-for-one to have a vibrant fishery, and our fisheries will start to close if we open it up back up, and I guess what I'm saying is I think, with the about 500-plus snapper grouper permits that we have, fulltime permits, SG 1, we don't have a strong enough fishery to do what I see in front of me on this screen, and I hope that we get there.

I think, hopefully with some stock assessments that come back in a positive way, that we'll continue to get there, but, when I see things like red porgy and red grouper and some of these other fisheries that are in decline, I can't support it, but, at the same time, I don't want somebody to say, well, I'm just thinking about myself, because I'm not, and I could bring my twenty-two-year-old to the microphone, and he will tell you exactly what I'm trying to do to help people like this. Thank you.

MR. MAHONEY: May I address some of that that he said?

MR. HULL: Certainly, Andrew, since you brought up the subject here, and let's go.

MR. MAHONEY: We really don't have that opportunity in South Carolina like you are providing for your guys coming up. Another thing is that, off of our coast, especially on the weekdays, I may go days and not see another fisherman, or another human being, for that matter. Our fish that we're involved with, they lack the migratory characteristics to make them subject to a broad regulation against permitting, where these fish aren't leaving more than a hundred miles in their life, in their entire lifespan.

A lot of times, they won't even get that far, and so those MSYs and annual catch limits are great and all, but they don't really directly regulate the fish in order to be sustainable, not the type of species that we're involved with now, and so, if you make -- If you have ten permits in one area, taking out -- If you have one permit in another, and those ten permits are taking out most of the

annual catch limit, then that area is being overfished, and another area is not being -- It's not getting all the way to its annual catch limit, and I hope you can understand what I'm saying, and I have a hard time relaying. Like I said, I don't have a whole lot of human contact, and so --

MR. COX: Well, Jimmy, if I may --

MR. HULL: Yes, go ahead.

MR. COX: I think that -- I hear what you're saying, and we have regional differences in our fisheries, and it's going to take a lot of thought and try to figure out how to move forward, but I can only tell you what I've done and what I'm trying to do to help my fishery and my fishermen in my area.

I've got one permit that I lease out for \$7,000 a year to a fisherman, and I've got a deal cut with him that, if he decides to buy it, that we'll work out a lease-to-buy kind of deal, but, you know, I've got a lot of money in these permits, and I have paid my dues, and I have done what I can for the fishery, and part of that is to make sure that we have a sustainable commercial fishery. My boats fish from North Carolina down into South Carolina, and so we fish throughout the range of two states, but I will do what I can, and I love to see newcomers trying to enter the fishery. I know it's expensive, but hopefully you can find somebody that's like me that is willing to reach out and help you any way they can. Thank you.

MR. MAHONEY: I mean, I don't think that that's going to be possible. I mean, I've gone through my entire life without seeing one come for sale where I live, and I don't even know anybody in the commercial fishing industry where I live that is in the hook-and-line sector, and so I guess that means good luck.

MR. COX: Well, I don't know. Like I said, hopefully, if you're in the fishery, and obviously you must be leasing a permit, or letting somebody use it, and maybe there is that person or somebody else that you can start leaning on and say, hey, I would like to start working my way into buying this permit, but I look forward to meeting you sometime and maybe have some more conversation with you, but it's a great business, and we want to keep it that way, and I'm afraid that, if we go to the one-for-one, it won't stay sustainable.

MR. MAHONEY: Right, but, you know, similar to what's happening with red porgy -- I mean, you're not going to have a commercial fishing industry, and so all this work that we're all sitting here doing isn't going to mean a whole lot.

MR. COX: Well, I tend to disagree. I mean, we've done a good job with red snapper, and, you know, we're rebuilding some of our fisheries, and that's why I'm here. I am rolling my sleeves up, and I want to get involved and make this fishery hopefully as close to what it was when I entered the fishery in the 1980s for you guys, and that's why I am giving up my time, and that's why I didn't go out fishing, and I gave up a couple thousand dollars this week of fishing, but I'm here to help the fishery, and my goal, at the end of the day, is to see a vibrant fishery, commercial fishery, for people like you.

MR. MAHONEY: Well, thank you for that.

MR. HULL: Thanks a lot, Jack. Randy McKinley, you're up.

MR. MCKINLEY: Thanks, Jimmy. I mean, that's exactly what I was going to talk about, was the two-for-one. First of all, I want to congratulate Brian and Myra, real quick, and this is to Cameron. I pack fish for five boats, including myself, and maybe I could get some of that material, those rulers and stuff, to pass out.

Then again, I want to reinforce what Andrew said, and I'm going to disagree with Jack. The last council meeting, it was mentioned that a while paper was going to be possibly done this spring for the snapper grouper permit, to do away with the two-for-one, and I think it's way, way past time to do this. You know, I understand, and I know Jack is concerned that we've got to address the inactive permits and the latent permits, and then let's do it. Let's get moving on that.

Historically, our fleet has been owner-operated and consolidated into bigger fish houses, which I would like to see it kept that way, and our fleet is aging out, and the corporate permits can be a roadblock to new entrants, switching them from state to state and making sure the corporation has followed all the laws, and that can be tricky. I hear some say that we need to reduce the fleet, but I don't think that our fleet is the problem. Our fishery is -- The problem is in all this increase and the unaccountable recreational fishermen and the diving pressure that we're seeing.

To me, our commercial fleet cannot afford to keep losing numbers, especially in North Carolina, where it seems like some of these permits leave, and they don't come back, and our voice is getting smaller and smaller as it is, and we're going to lose fish houses that is not ever going to come back, especially the small fish houses, and so I appeal to the council to move on studying and recommending doing away with the two-for-one requirement in the snapper grouper fishery and then somehow set up a pool for each state, to try to encourage new entrants, and that's what I have got to say about the two-for-one.

MR. HULL: Those are great comments, and that's why we're here talking, to get ideas to try to make this better. Thank you, Randy. Tony Constant, you're up.

MR. CONSTANT: I am talking about Andrew, and, Andrew, I'm in your neighborhood as well, and I live in Beaufort, and I know what you're saying is true. The industry here has been -- It's slowly, slowly just depleting over the last twenty or twenty-five years, and I also hear Jack. I fish -- I'm more of a sportfishing kind of person in the charter business, and I have fished from Mobile to the Chesapeake, and it's a different industry here in Beaufort. It is slowly going away, and I think a lot of it has to do with -- As far as in the county and in the state, the real estate has become worth more than the docks, and the fish houses are depleting and going away.

As a matter of a fact, I live right beside -- My dock is beside the old Shipman's Docks, which was some of the biggest around here, and they're totally gone. The land is up for sale for lots, and individual owners are buying it now. I don't know of another commercial fisherman in your area, Andrew, and I was one of the charter captains for years that dabbled around in hook-and-line, but it's a hard one for you, and you're right. In our industry, you go offshore, and you don't see another person for days. There is just not that much fishing pressure.

I feel for you, and I understand Jack's view, and you're in a busy market. I know that some of the other charter captains that do offshore charters, when it came time -- As we were younger, we had



to cross that bridge of whether we wanted to move or not. You either go to Hilton Head and become a charter, and you're not going to make a good living out of it out of Beaufort, and I know the commercial industry is a lot different, and you've got to select your houses to get your market price, but I feel for you, and, from where I'm sitting in South Carolina, I agree with getting rid of the two-for-one.

MR. HULL: Thanks for that, Tony. David Moss, you're up.

MR. MOSS: Thank you, Jimmy. Some of this was somewhat answered, but, as a recreational fisherman, I have just a couple of questions. What is the going rate for a snapper grouper permit right now, just out of curiosity?

MR. HULL: Well, I can tell you, from my perspective here in Florida, a corporate permit will cost \$90,000, to \$100,000, and the two-for-one is just cut it in half. You're going to have \$40,000 or \$50,000 apiece, and you have to buy two of them, and so they kind of equal out, when you're trying to buy them, when they're available. I mean, there's not a lot of them for sale, because people -- It's a valuable fishery to be in, and so it's hard to find them for sale, but those are the numbers that I have, and somebody else may have some different ones.

MR. MOSS: That actually let me exactly to my second question, Jimmy, and you kind of halfway answered it. Is it a price issue, or is it an availability issue, as in you can't find -- I think it might have been Andrew that said it initially, that he can't find one, much less the two, and so then my follow-up question to that would be how much of a difference would reducing the two-for-one make if you can't find one available right now, whereas wouldn't our -- Shouldn't our focus be more on the latent permits and the unused permits and things like that?

Then the last thing that I will say, and then I will kind of listen to everybody, and Tony hit on this too, and I know that the commercial guys are really under siege by a lot of things, and not the least of which being, and probably the most, is running out of working waterfront, and I do feel for you guys. There is just no more dock space anymore, especially in Florida, and I know, Jimmy, you can probably speak to this better than just about anybody. In fact, a commercial guy that I know almost literally has to sell his fish in a parking lot, because there's just no more dock space to be able to offload that anymore.

MR. HULL: Thank you, David. You hit on -- Everything you said is important, and I think starting with the two-for-one, from my perspective, needs to stop, so that we at least have permits to potentially be for sale, because, as we continue to reduce them, there is going to be less and less that could potentially be for sale, and we still have the availability of the -- The only way you can really get into the fishery, if you don't have access to that kind of money, is to lease, and there is leasing available, and so that is the most inexpensive way to get into it. There are dealers, and there are permit dealers, and there are permit sites that you can go to try to find these permits. Go ahead.

MR. MOSS: That was my other question, and you hit it, and I forgot to ask it, and it was about leasing, and how does that -- Again, I'm a recreational fisherman, and so how does that work, exactly? Do you lease the permit, or do you have to lease the boat, or do you have to lease both? I'm a little confused on how that works.

MR. HULL: You have to lease the boat, and so it is a little bit convoluted. You don't lease the permit, but the permit is tied to the boat, and so you have to lease the boat, and it's pretty much just paperwork, is what it is. There probably are some legal issues and some liability issues involved, and there are chances you may take in leasing somebody else's boat, and so it's tricky, and we did have a presentation on all of this, I think, from the Permits Office.

MR. MOSS: We did, a few meetings ago, and you're absolutely right, and I'm not going to lie, but I walked away from that a little bit more confused.

MR. HULL: We probably need another presentation coming up, and so I would recommend that, that we continue this talk going and recommend that we do have some information from the agency on the entire permit situation, so that we can make better choices and recommendations to the council, and so that's where I'm at on it also, and so I think that's something that we should do to dig into this, and we need to move on from this, because there is others that want to bring up items, and so I'm going to move to Chris Conklin.

MR. CONKLIN: Thanks. I have enjoyed listen to you all's conversation this week, and it's been very good, and thanks for providing me the opportunity to speak as well. As far as the two-for-one, I mean, there is issues with the permits, and barriers to entry, as with any business, and, if I was going to be a fulltime snapper grouper fisherman, which I bought a corporate permit, and I put two together to make one, and it wasn't easy, but I did it.

I did with help from the Fishermen's Resource Group out of Texas, and you reach out to them and tell them you want an individual permit, and I bought a boat and a permit from a fellow, and he passed away, and the permit had to go through probate, and his sister could have signed off on it just as easy as -- Renewed it in her name, and, in good faith, she did the right thing. I gave a crook permit dealer in Florida \$29,000 to get me an individual snapper grouper permit, and he took my money and never gave me crap, and so a reputable group out of Texas did a fine job, and they sent out mailers, and it was a matter of about a year-and-a-half before I was able to combine everything, but I did it, and I'm still making payments to the bank, but I've got it legal.

As far as the resource goes, I sort of resonate with about a fifth of the boats catch 90 percent of the commercial fish. If we had every permit out there turn into a full-time working business, we would be in a bad place, and so I really don't think there's enough fish to go around for even the permits that we have now. We're getting to where we need to be, but that's only because people that are dying out of the fishery -- Their relatives are keeping the permits and leasing them out to part-time weekend warriors that want to be able to sell their catch to pay for their fuel, which, I mean, it's legal, and so no problem there, but, if you want to get these permits moving and changing hands, perhaps we need to look at the leasing, and maybe we could put like a time cap on how long or how many times an individual permit could be leased out before it was considered done or had to change hands. That's how I see sort of a solution to getting more of them freed up.

I have also bought a corporation out of Georgia, a corporate permit and a boat. It's not registered in Georgia, and all I had to do was run a newspaper ad for like a week in a newspaper, and I dissolved the corporation, and I reestablished it here in South Carolina, and it wasn't hard to do, and so the tax thing and state lines and all, and it's pretty easy to move ahead and get yourself aligned.

It sucks if people want to get in the fishery and they can't find a permit, and I certainly applaud people for trying to do the right thing and be legal, and I would highly encourage reaching out to that group out of Texas, the Fishermen's Resource Group, and they can probably find you whatever you want, but it just takes a little bit of time. With that, I will sign off. Thank you.

MR. HULL: Thank you, Chris, for that information. I have heard that you can move the corporate from state-to-state, and I didn't know -- You have done it, and somebody else told me they've done it, and I think it was Jim Freeman. Okay. Thank you. James Paskiewicz, you're up.

MR. PASKIEWICZ: Thanks, Jimmy. I mean, as a member of this fishery for most of my life, and I've been through all of the limited access from the inception, the two-for-one historically has been a great tool for us to limit the number of permits, and I think, essentially, I'm going to have to go with Jack here on this.

We're just going to end up with a corporate permits, and, if you've invested into this industry, because you know what it takes to produce the fish, and you know what it takes, what kind of investment it takes, to do it, and you have calculated a long-term plan for what these permits are going to be worth for you now and what they're going to be worth for you, possibly, when you retire.

I mean, I can't feel like I'm the only one who is looking at this as a long-term situation for me and my family, and so, a few years ago, when I bought two permits, at roughly \$35,000 apiece, for a \$70,000 total investment, I'm kind of counting on that, when I go to sell it, to be worth \$70,000. If we go from a two-to-one to a one-to-one, arbitrarily, then everybody who ever bought two permits to have one is going to take a loss, and, you know, for those of us who love it, we're not going to care, long-term.

I mean, if my permit value is cut in half, or a third of it goes away, it's not going to be the end of the world, because I did get to do what I love to do for a number of years, but, I mean, looking at it, ultimately, we're going to reduce the number of permits, and anybody who buys two to get one at this particular juncture, if they're not putting it in a brand-new corporation and starting fresh, knowing that you can sell a permit, a corporate permit, for almost double what you can an individual, I don't think you're making a very smart business decision, and so what we're going to end up with is, if we have roughly 500 now, and I don't know how many of them are still individual permits, but, at some point, you're going to be left with nothing but corporate permits, and you're going to have a number of corporate permits, and then it will naturally materialize into a one-to-one situation.

It's going to happen, because all you're going to be left with is corporations, and so, I mean, I think that this is going to end up fixing itself in the long term, and it really won't change the fishing pressure so much, but it's just basically going to dial it into the survival of the fittest, and I don't like to say that amongst fishermen, but it's really the truth, and I know, geographically, we have problems in different areas, and we do have working waterfront disappearing at just a really high rate, and so we have a lot more challenges faced than really this two-for-one issue, and I just think it's going to go away on its own. Thank you.

MR. HULL: James, thank you. Those were some really good points. Very good points and comments. You know, there's a lot of different angles on this, and so thank you for that. Cameron Rhodes.

MS. RHODES: Hi, guys. This is kind of unrelated, but I just wanted to follow-up, since someone, and I think it was Randy, had actually mentioned that they would be interested in getting some stickers and swag things related to best fishing practices, and so, based on the kind of overwhelming interest from the AP in our discussions yesterday, I'm going to go ahead and say that we'll mail wallet cards and stickers to each of you on the AP for you to distribute as you see fit and have on your vessels or get them in the hands of people that you think will be able to share them with others, and so we'll be sure to mail those out to you in the next couple of weeks, and then you will have some nice swag to distribute.

MR. HULL: Perfect. I was hoping you were going to say that. Thank you. Jack Cox, you're up.

MR. COX: Jimmy, just to answer a few questions here back about the permit thing, because you know that's near-and-dear to my heart, and I'm very sensitive to it, because I've got about 35 percent of my net worth invested in permits, and I've got king permits as well, but just to let you know that I have worked hard my way through this fishery, man, and I will tell you what. I have paid my dues, and I have built a hell of a business, and I have done well with it, Jimmy, just like you have, and, if I were to go in and buy your business tomorrow, and we would sit down and talk about what it's worth, you would be taking into consideration a lot of the things that I'm thinking about with my permit, and it's an investment, just like your property is.

I am trying to give back to the industry, and I'm trying to do -- I sold my permit, and we were talking about what they cost, for \$65,000 within the last twelve months, and that's what I sold a corporate permit for. They're worth more than that now, but you know something? I am trying to help somebody. The other thing is the king mackerel permits are a one-for-one. Those permits today, if you can find one for \$12,000, buy it. It's a gift and an investment.

King permits are expensive, because we've got a robust king mackerel stock, and all the things we talk about and the things we're trying to do, and, at the end of the day, I'm glad to see such a good fishery and how healthy it's been through the years, and so, with that said, those permits are becoming more and more valuable, because people are making money with them. King prices today, ex-vessel to the boat here, is \$3.25 or \$3.50 a pound, and that's big money for king mackerel, maybe because you guys have got some rough weather in Florida, and I don't know.

Just look at the price of fish, and that's why these permits are so expensive. My god. I mean, b-liners are paying to the boat four-and-a-quarter a pound, and grouper is six or seven bucks a pound, and amberjack is \$1.75 a pound. Pink snapper is \$3.00 a pound, and that's why they're expensive. I just wanted to put that out there. Thank you.

MR. HULL: Jack, thanks. Great points, again. I appreciate it. All these bullet points that we're getting up here are good discussions, and, getting back to Andrew Mahoney's dilemma that he is explaining to us, we've got to try to find a way to help guys like Andrew, that are in areas where there is -- He is telling you that he's by himself there, and I know we're all willing to help him, and that's why we're here talking about this. Randy McKinley, you're up.

MR. MCKINLEY: Thanks, Jimmy. Just a couple of things. I am still representing the individual fishermen, and I disagree with James. I think that -- Completely, I believe that, if we go one-for-one now, that whatever you pay for that permit, whether it's \$40,000 or \$50,000, and I think that the price will more than double very quickly, and I guess one reason is I'm older, and, if I had to sell mine, I've got to -- You've got to find two people to buy a permit, but you've got to find somebody to buy the boats too, because they're not going to sell the permit without selling the boat, and so you're looking at two permits and two boats, and it makes it very hard, and I think that whatever a person paid for it, if we go one-for-one, that you're going to see that price -- I think it could be worth \$100,000 or \$150,000 in a few years, for that permit, and so any concern over losing money I don't think is going to be there. There's too many people that want to get in it, and there's too many people that has got money to get into it. Anyway, that's my thoughts on that.

MR. HULL: Thank you, Randy. I am going to go back to Andrew.

MR. FISH: First up, I would like to say that I respect everybody's individual predictions that they're in, and I'm not judging anything, but I think the reason these permit prices have gotten so out of control, mostly, is because people are brokering them and leasing them. You've got people leasing these things for \$9,000, and that's what is driving the price. I would love to buy one for \$65,000 or \$70,000 or \$80,000, just so I could lease it. Where else are you going to get 10 percent on your money every year, guaranteed? I think that's a big problem, and I think you've got to get back to the fish and the fishermen and not so much the permits and what they're worth and think about the people that are in the fishery.

Some of us didn't pay for our permits, and, yes, we're fortunate to get in before all this happened, and I understand all that, but it's really about conserving the lifestyle and the fishery and the quality of life for the people in the fishery, and, before I get off that, somebody put out an email, and I'm sorry that I forgot his name, about the lessons learned from the September meeting, and it said that the advisory panel agreed that the gag fishery was not -- That it was abundant, and I never saw another email, but we walked away from that meeting, at least the one that I was in, that the gag fishery was not abundant, and that's all I've got.

MR. HULL: All right. On what you said about the gag, the fishery performance report, you said there was an email in reference to that, summarizing it or something?

MR. FISH: Yes, and it was from Myra, and she put like an overall view of what was done, and the way I read it, and I'm sorry, and I forgot the guy's name, but it might have been -- Actually, it was Harry Morales, and it was from Myra Brouwer, that the overall grouper -- The gag FPR final stated that everybody walked away from the meeting thinking that the gag fishery was great, but that's not what I remember, and I am just making sure that was known, or I never saw another email about it.

MS. BROUWER: If I may clarify that?

MR. HULL: Yes, ma'am. Please.

MS. BROUWER: Thanks, Andy, for that. I believe, if you look at the fishery performance report, some AP members said that, in their areas, they had seen a recent increase in abundance of gag, and other folks were saying, in their areas, they had seen a decrease, and so I think what I tried to

capture was that there was no real consensus on whether the abundance overall has increased or decreased, and it's just sort of more area specific, and, if I didn't capture that in the report, then I am more than happy to go back and edit it. It's been kind of difficult, because I don't have the recording of what you guys all said, and so I've been having to go back and listen to the audio, and it's just not that easy, and so, by all means, if you -- After reading that report, if you have edits for me, please send them my way, and I would be more than happy to make those corrections. Thank you.

MR. FISH: Yes, ma'am.

MR. HULL: Thank you, Myra. Robert Lorenz, you're up.

MR. LORENZ: Just a quick question, and it's on the second bullet from the bottom, and I'm kind of following up, kind of in the same spirit of David Moss. You know, recreational fishermen are very interested in the vitality of commercial fishing and the issues you're dealing with, and we're here to help think, even though we don't do it.

You can't sell a permit without a boat, and I am unclear. Is that a law or a regulation or a requirement for a permit, or is that just practice? For instance, Jimmy, if I wanted to buy a permit, and I come to you, may I buy your permit, or must I also buy a boat, by some regulation, or is it just you, by practice, are not going to give me the permit without the boat?

MR. HULL: It's by practice, because, generally, if you have a commercial vessel -- It's pretty hard to sell one without a permit, and it's just harder to do, and so it's easier to sell the permits tied to the vessel, and it's a way to get a permit, and so sometimes you have to buy a vessel that you don't really want just to get the permit, because the seller won't sell the permit without selling the vessel. Okay?

MR. LORENZ: Yes, and thank you. So, if you were an interested investor, you must want to own a boat with a permit and hire or pay somebody to run that boat for you.

MR. HULL: That could happen. Yes, sir.

MR. LORENZ: Thank you.

MR. HULL: Harry Morales, you're up.

MR. MORALES: I just wanted to comment, and, yes, I was the one that sent out that email regarding the gag grouper. In my opinion, that first paragraph, it made it a 50/50 proposition, when, in fact, my feeling of that whole conversation was that, generally speaking, the AP felt that the gag is under pressure. However, there were parts, or areas, that were not experiencing that, and so I just wanted to reinforce that, and I just felt that, as a summary from the very beginning, it was sending the wrong message, as far as the conversation that I thought I heard.

MR. HULL: Thanks, Harry, and that's the way I read the summary of it also, is that there's a few bright spots, which we've actually seen a few bright spots off of northeast Florida in the last couple of years, but, overall, the fishery has been in decline, but I thought that it hit it appropriately, but maybe I'm missing something there also, and thank you for clarifying. Andrew Mahoney.

MR. MAHONEY: I just wanted to ask about the leasing and brokering, and I don't really -- I mean, is that experienced in every state, and I don't mean to make the minority the normal, but like, if you're in North Carolina, and you know one guy that leases a permit, that's not what I mean, and I mean an actual market for brokering and leasing. I am pretty sure that's all coming from the State of Florida, and am I correct about that?

MR. HULL: No, and staff could answer more appropriately, and, obviously, these are federal permits, and they're across from North Carolina to Florida, and leasing happens in every state, and there is brokers all over the place, and I think Chris Conklin recommended one, and so I don't know if that helps you, and maybe staff could further that?

MS. BROUWER: Jimmy, I'm sorry, but I don't know the details of how brokering and leasing all works with permits, but I would be more than happy to get back to you, Andrew, if I can find any information on that for you, next week.

MR. MAHONEY: Thank you.

MR. HULL: Okay, folks. We need to -- I see, Jack, you're there, and we've got like eleven more minutes, and then I'm going to close this meeting. There was the concern over triggerfish, and I think you brought it up, Jack, and so here you go. Jack.

MR. COX: Harry, I just wanted to say that I don't think the fishery performance report really put in place what the general consensus of the group was. I think that the majority of the group felt like we've got some work to do on gags, and I'm glad to know, Jimmy, that you've got a bright spot, but we don't where I'm at, and we've got to work on it, because I am concerned about it, and I felt like that was the majority of the AP's consensus on that.

Anyway, I would like to see somebody go back to that report, Myra, and I know that's a little bit of work, and maybe clarify it, if it looks like it was a little bit brighter than it should have been, but I think the general consensus of this group was that we've got quite a bit of work to do on gag.

I wanted, Jimmy, real quick to -- Our business is a boutique business, and it's very small, and it's hard to move permits and things around to people that want them, and there are brokers in place, and they try to match people up with a permit, and sometimes you can go to Craigslist and find somebody that's got something for sale, but it actually happens a lot easier by word-of-mouth, and, in our industry, you don't -- National Marine Fisheries Service does not lease permits. What happens is we lease a boat and put a permit on it, and so, if you have a boat and you want to lease my permit, I will lease your boat and I will my permit on it, and so we're kind of in business together, and that's how that works.

There is a guy here, and he's got a fishing boat, and he's aging out, and he's got a guy that wants to buy it, and he's selling his fishing boat to a guy, and he's keeping his permit on it, and the guy has become partners with him on the boat, but not the permit yet, and they've got a deal worked out for that, and so he's looking for another permit to match up to it so that he can buy the business as a whole, and so you see that done a lot, because our fishing boats are unique animals, and nobody is going to really go out and buy a traditional snapper grouper boat without a permit, but these permits lease between \$7,000 and \$8,000, is what they are leasing for, which is not that much

money when you look at terms that you're able to generate revenue of \$200,000 with that permit. Thank you.

MR. MAHONEY: Can I say something, real quick?

MR. HULL: Go ahead, Andrew, and then hopefully we can wrap this up, because there's a couple more things that we have to get to, real quick.

MR. MAHONEY: Absolutely, and I will make this quick. It's really got more to do with a longevity and having the right kind of business behind the permit holder, and, when you're dealing with a business on your end where you're leasing from somebody that doesn't quite have the right business ethics, it could turn negative for you really quick. In my case, I don't know anybody, except for this one guy that I bought his boat from, and then he leased me the permit with no intentions of selling it, and, if it comes down to the point that he wakes up on the wrong side of the bed one day, and he doesn't want to lease me the permit, then I am going without one, and this is all to keep me from going to jail, and so, anyway, that's where I stand on it.

MR. HULL: All right. Thank you, Andrew. I've got two guys with their hands raised, and, if it's on this subject, then we're going to stop, because there's a couple more things that we've got to do, real quick. David Moss.

MR. MOSS: I just wanted to be in the queue to make a motion once this was done.

MR. HULL: Yes, sir. Randy McKinley, you're up.

MR. MCKINLEY: Just real quick, I voiced my concern over triggerfish also, and it would be -- I mean, that's become very important for us, and I would reemphasize that almost the people that I have talked with would love to see a reduction to 500 pounds on trip limits on gags, and that needs to happen soon, we feel like, and I would thank everyone for such a great and informative meeting today, and that's it.

MR. HULL: Richie Gomez sent an email to myself and to Myra, and there is something that he wanted to bring up, and he did this ahead of time, and so we're going to follow through with this. Possibly, Myra, you could maybe paste the email, and his future hope is that there's some adjustment to the shallow-water grouper closure for the guys down in the Keys, to where they can possibly keep some red groupers and some others, some other situations he has here that he explains, and I know that we have recommended, as an AP, that we re-address the snapper grouper spawning closure, and so this kind of ties into that, and so I don't know how to -- This could be a discussion that could last for a long, long time, and so I just want to make note of his request that we look at the snapper grouper closure and possible changes to it.

I think that you have it pasted there now, and I really don't think that we can get into this discussion right now, because this is a whole new world of discussion that will take a long, long time, and we don't have it, but we have it here, so that the council can see it, and we can talk about it again in the future, because it's not going to happen quick anyway. Hopefully Ritchie is good with that. David Moss, you're up.



MR. MOSS: Thank you, Jimmy. Just going back to what we were talking about with all the recreational reporting, and I know that we made recommendations for a few things, but we never made an official motion, and I don't know -- I will bow down to you and Myra and Bob Lorenz about if we need to make an official motion to recommend to the council to heavily look into recreational reporting again. Like I said, I know that we had spoken about it, but I don't know if we need to or if that conversation that we had yesterday or the day before was enough.

MR. HULL: Well certainly you can make a motion, and I think that, in the minutes, we made strong recommendations, and not in a motion form, but recommendations that, obviously, through all of our conversation that we need some reporting and some possible permitting, and on and on and on, and that was a long discussion, and so that's up to you. If you want to make that motion, we can probably quickly dispense of it, because I think most of us are in favor of that, and so go ahead.

MR. MOSS: Thank you. **I will make the motion that the AP recommend to the council to look into, again, the issue of recreational reporting.** My wordsmithing is terrible, and so, Myra, help me out, if you feel brazen enough.

MR. HULL: **How about if you said, "the need"?**

MR. MOSS: **I am okay with that.**

MR. HULL: Once she gets that, then look at it. Everybody look at it, and, if we can get a second, then we'll dispose of this quickly.

MR. MOSS: **Can we say "better", because we do technically have recreational reporting right now, but "better and more timely recreational reporting".**

MR. LORENZ: May I add something, David, for you?

MR. HULL: Go ahead, Bob.

MR. LORENZ: At the end of "recreational reporting", "to include an option for a permit, license, or registry", if that's okay with you, David.

MR. HULL: Can we just do that as a for example, rather than saying it as an option, because I don't want -- If we're going to do the permit, license, registry thing, I don't want that to be an optional, and so, if we want to say that as an example, I would be happy with that.

MR. LORENZ: Okay. Or to include looking at, and you can change it from there then, but I just wanted them looking at that too again, and we always keep putting this in.

MR. MOSS: That's why I just wanted to make sure that it was officially a motion on the record.

MR. HULL: How is that looking to you, David?

MR. MOSS: **That's fine.**

MR. HULL: Okay. Who is going to second it?

MR. LORENZ: I will second it.

MR. HULL: We've got a second from Bob. I'm going to read it, and I see Jack's hand is up, but I don't know that he's going to be opposed to this, and he can speak up if he is. If you're opposed to this, after I read it, raise your hand. **The motion is recommend that the council continue to explore the need for better and more timely recreational reporting and consider a permit/license/registry for the private recreational sector. If you're opposed to that motion from the AP, raise your hand.** Jack, your hand is up. Is it in opposition to this or further comment?

MR. COX: No, Jimmy, and I was trying to use the formal format here, rather than just blaring in, but I was going to second the motion, and I was just going to add "private recreational" to the motion. Thank you.

MR. HULL: Okay. Well, that's already there, and so we're good. **I see no opposition, and so that passes.** All right, guys. I think that you guys are fantastic, and the staff is fantastic, and I'm proud to be associated with all of you all, and I think we've had a good meeting, and, at this point, I am going to hand it back to Myra to give us information on future, but, after that, we're done.

MS. BROUWER: Thank you, Jimmy, and thank you, everybody, so much for your productive meeting. The council, and I think I can speak on their behalf, really appreciates the time that you put in to sit through these meetings and learn and bring your expertise and make recommendations that they can then bring to the table, and so I really appreciate that, and, as far as an upcoming meeting, we're probably going to look again to probably in April, as usual, and so be on the lookout for an email from me, or whoever is going to take on this job, in the next few weeks, and so thank you all so much.

MR. HULL: Thank you, Myra. Meeting adjourned. Thank you, all. Be safe and be successful.

(Whereupon, the meeting adjourned on November 6, 2020.)

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Transcribed By: \_\_\_\_\_ Date: \_\_\_\_\_

Transcribed By  
Amanda Thomas  
November 18, 2020

# Snapper Grouper Advisory

## Attendee Report: Panel Meeting

Report Generated:

11/04/2020 05:03 PM EST

### Webinar ID

282-769-443

### Actual Start Date/Time

11/04/2020 12:49 PM EST

### Duration

3 hours 46 minutes

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# Snapper Grouper Advisory

## Attendee Report: Panel Meeting

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8 hours 39 minutes

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## Snapper Grouper Advisory

### Attendee Report: Panel Meeting

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11/06/2020 07:44 AM EST

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Cox	Jack
Crimian	Robert
Dalton Harrison	01BeBe
Darden	Tanya
Doll	Cameron
Duffin	Benjamin
Errigo	01Mike
Finch	Margaret
Fish	Andrew
Freeman	Robert
Gamboa-Salazar	Keilin
Glasgow	Dawn
Griner	Tim
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Helies	Frank
Hiers	Homer
Howington	Kathleen
Hudson	Rusty
Hull	James
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Iverson	Kim
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Lorenz	Robert
Mahoney	Andrew
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