Project Title: Pilot Test of Recreational Released Catch Cards into the Sampling Design of the MRIP APAIS

Progress Report Period: April 1-December 31, 2025

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Executive Summary
Catch cards were given out to anglers prior to their fishing trips at private/rental boat site groups during overdrawn morning assignments in a modified sampling design to the Marine Recreational Information Program's Access Point Angler Intercept Survey in eight pilot states on the Atlantic coast. The goal was to collect supplemental information on fish discarded recreationally that is not usually collected in the Access Point Angler Intercept Survey, specifically the depth fished and lengths of discarded fish. We wanted to also explore if notifying anglers ahead of time that we'd like them to collect information on their discarded catch would improve estimates of the number of fish and species released on their trips. A total of 470 overdrawn assignments were completed. Of the 2,185 catch cards handed out, 21% of them were returned and most of those were returned to the field interviewer directly. Lengths were submitted for 1,326 fish across 38 species with the most submitted for Black Sea Bass (241), Scup (149), Summer Flounder (134) and Red Drum (127). The most distributed and returned cards occurred for single site assignments and for weekend days from 8am-2pm. While we would need more data to definitively make conclusions on if angler recall was improved from the use of the catch card, there is some evidence that the catch cards resulted in more species being reported as released and less digit bias in the release numbers reported. Overall, the inclusion of the catch cards into the Access Point Angler Intercept Survey design did not appear to influence interviewer productivity. While the return rate of 21% was respectable, the total number of returned catch cards and lengths were lower than anticipated. We believe that this could be improved by focusing on methods that maximize the number of cards distributed and returned as well as increasing the number of sampling assignments with the possible inclusion in the future of the catch card supplement into the Access Point Angler Intercept Survey.

Introduction

This project tested a modified sampling design to the Marine Recreational Information Program (MRIP) Access Point Angler Intercept Survey (APAIS) to collect additional information from randomly selected anglers about their discarded fish during a recreational fishing trip. This calendar year 2025 project offered use of a catch card as a supplementary sampling design to enhance the understanding of discard information in recreational fisheries along the Atlantic Coast by collecting additional data on depths fished and lengths of discards, both of which can affect discard mortality. These data are often missing from stock assessments or borrowed from other data sources such as volunteer angler surveys, tagging studies, or headboat surveys. However, these other data sources may not best represent the private boat fleets which make up a large proportion of releases for many recreational species along the Atlantic coast. Given their large estimated contribution to releases of many recreational fisheries along the coast, private/rental boat (PR) mode was the main focus but collection from multiple modes were possible at the discretion of participating state partners. The specific objectives included:

- Requesting prior to the start of a fishing trip that anglers record traditional discard information that is currently collected through the APAIS (e.g., species, count, hours fished, fishing area).
- Collecting additional fields relevant to discard mortality (e.g., depth and lengths of discarded fish). This would be beneficial for the private/rental boat mode which comprises the majority of recreational discards for several key species.
- Using the same stratified random sample design, or probability-based sampling, as the APAIS will allow comparison to existing APAIS discard data collection and explore if bias exists.
- Compare data collected via catch cards to existing headboat and dockside sampling or other data sources (i.e. volunteer anglers surveys, tagging data, etc.) for select species.
- Educate the recreational fishing community on the importance of accurate discard

information in fisheries management and stock assessment.

- Educate the recreational fishing community on discard mortality, barotrauma and safe fish handling techniques.

Methods

Work on the pilot catch card project at the beginning of 2025 was focused on preparing for the sampling season which began in May 2025. More details on the activities completed are provided below.

- Preparation for field sampling
    - The Catch Card Project partners from the eight participating pilot states finalized the design of the catch card, deciding on what fields would be collected as well as the layout of the pre-paid postcard. The final catch card can be found in Figure 1.
    - Setting up Business Reply Mail (BRM) Accounts and Printing of Catch Cards–ACCSP staff met with the U.S. Postal Service to set up BRM accounts for the eight pilot states under a centralized ACCSP account and made sure the catch cards were formatted properly for BRM. Once finalized, the catch cards were printed and mailed to each pilot state.
    - Training Materials Developed and Staff Training – Training materials were developed by the eight pilot states describing the catch card procedures. Each state conducted their own training with field staff identified to participate in the catch card pilot program.
    - Ordered Catch Card Supplies–Pilot states ordered additional materials for field sampling, specifically golf pencils and measuring tapes to give out to anglers along with the catch cards to aid them in measuring and recording their released fish. States at their discretion could also purchase additional items to hand out to anglers such as small clipboards, stickers, etc. to either help anglers collect the data and/or to thank them for their participation.
- Coordination with MRIP staff for Assignment Draws–Based on the field implementation schedule for 2025 (Table 1), ACCSP staff coordinated with MRIP to provide overdrawn (i.e. extra) sampling assignments for those states participating in the pilot project. These assignments were focused on the PR site group for 8 am-2 pm and 11 am-5 pm assignment intervals to allow field interviewers to hand out catch cards to anglers as they departed for their fishing trips which predominantly occur in the morning hours.
- Developed Outreach Materials – An ACCSP website page (https://www.accsp.org/release_project/) was developed which provides additional information on the project. In addition to explaining the project in greater detail, it includes examples of how to fill out the card as well as how to measure the total length of any fish released. It also links to websites that describe best practices for releasing fish. Anglers could access this information using the QR code found on the top right of the catch card (Figure 1).
- State Conduct of Catch Card Assignments–Pilot states began conduct of the catch card project in May 2025. These assignments were completed through December of 2025, depending on state (see Table 1 for the 2025 implementation by month and state). Specific activities related to state conduct included:
    - Catch cards distributed to anglers as they started their fishing trips and collected while on site at sampling assignments by field interviewers. Field interviewers could arrive a minimum of 1 hour ahead of the scheduled APAIS assignment with the goal to only hand out catch cards during that pre-assignment buffer interval. Once the scheduled assignment time began, interviewers were to continue handing out catch

cards while also conducting APAIS intercepts. Catch cards not returned to the field interviewer could also be returned to the state either by mail, email, or for Connecticut via a drop box.

- Anglers were asked to record the lengths, rounded up to the nearest ¼", of the first twenty fish released for all fish that have either a bag or size limit (i.e. are managed). They could also record tallies for other fish species released that are either not managed, if they ran out of room to record additional lengths, or if they only wanted to provide counts.
- Catch cards returned to the states from all methods were entered into a specially designed section of the Assignment Tracking Application (ATA) by state staff. In addition to allowing for data entry on anglers' trip information and discarded fish length information, this allowed for the calculation of important metrics for the project such as the number of cards handed out on assignments, the number of catch cards returned, and the return method.
- Data entered by state staff underwent data review and checking after entry.
- The subcommittee of pilot states had monthly check-in calls to resolve issues with field implementation of the catch card project and to ensure consistent methodology across all states.

- Data Submission to NOAA Fisheries–Following the completion of data collection and QA/QC, angler interview data was submitted to MRIP for possible inclusion in the final estimates for 2025. This will depend on whether or not it's determined that the use of catch cards introduced any unintended biases that could preclude them being combined with the usual APAIS data.
- Data Analysis–There were multiple analyses conducted to analyze the catch card data collected. These are described in more detail below.
    - Basic statistics on the catch cards were collected by state and coastwide. This included information on the numbers of cards handed out (total and per assignment), the total number of intercepts collected on catch card assignments, the number of catch cards returned (total and per assignments), and the number of lengths collected (total and per card on average).
    - Length frequencies were developed for the species with the most length data collected. These species included Black Sea Bass, Summer Flounder, Scup, Spotted Seatrout, Striped Bass, and Red Drum. These length frequencies included all data collected from the catch card pilot (waves 3-6, all states, private/rental (PR) and shore (SH) modes, all areas (ocean and inland) combined).
    - Productivity and percent eligible anglers intercepted for catch card and regular APAIS assignments were compared to determine whether or not the catch cards impeded the ability of field interviewers to collect intercepts during a catch card assignment. In addition, the data were analyzed by state, month, modes, weekends vs. weekdays, number of sites per day and time intervals to see if there were differences in the number of cards handed out or returned.
    - Comparisons were made between the catch card and MRIP data to determine whether or not the use of catch cards affected the numbers of species reported as released when anglers were able to record them while fishing rather than recalling them after their trip. Similar analyses were done to see if there were differences in the total number of fish released alive as well as the number of fish released alive for the same six species used in the length frequency analysis. For the catch card data, both the lengths and tally boxes were summed to calculate the total number of fish released either across species or for each species. In general, most anglers did not use both boxes for the same

species. While the discard project did collect information on whether fish were released dead or alive, only live releases were used in this analysis due to the limited number of dead releases reported (only 12 across all species in the length data and none in the tallies). In addition, the MRIP public dataset only separates out live releases (B2s) and the dead releases are combined into the unobserved harvest (B1). Therefore, live releases were the focus of this analysis. The analysis also used data from only waves 3-5 as again, there was limited data in wave 6. The MRIP public catch datasets were also subset to just the PR and SH modes in waves 3-5 and only included data from the eight participating pilot states rather than the whole Atlantic coast. Comparisons are presented as the percentage of angler intercepts for the MRIP data or percentage of catch cards due to the large differences in sample sizes between the two surveys.

Table 1. Months of sampling overdrawn APAIS assignments for pilot project 2025.

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec	Total
MA					X	X	X	X	X	X			60
RI					X	X	X	X	X	X			70
CT					X	X	X	X	X	X			75
NY					X	X	X	X	X	X			65
MD					X	X	X	X	X	X			65
NC					X	X	X	X	X	X	X		50
SC					X	X	X	X	X	X	X		50
GA					X	X	X	X	X	X	X	X	50

Results

From May to December 2025 a total of 485 catch card assignments were drawn with 470 completed. A total of 2,185 cards were distributed during the assignments, with 467 cards returned. While return rates varied between states, ranging from 16-32%, the coastwide return rate was 21.37% (Table 2). Most cards received were returned to the interviewer on site (66%) and the remainder were submitted via mail (27%), email (5%), or drop box (2%, CT only). A total of 1,390 fish were submitted in the length section of the catch cards and entered into the ATA through December 2025. Out of that total, 1,326 fish had associated lengths with the number of lengths submitted per catch card varying quite a bit between states (from 1-5 lengths per card depending on the state). The species with the most recorded discard lengths were Black Sea Bass (241), Scup (149), Summer Flounder (134) and Red Drum (127) (Table 3). While lengths were recorded for many species along the coast, no lengths were submitted for Haddock, Weakfish, Gray Triggerfish, Red Porgy, or Vermilion Snapper, species which had been identified as priority species in the initial proposal. The average depth fished recorded along the coast was 16.7 feet with a minimum of 1 foot and maximum of 75 feet (Table 4).

Length frequencies for Black Sea Bass, Summer Flounder, Scup, Spotted Seatrout, Striped Bass, and Red Drum are shown in Figure 2. These species were chosen due to having the most lengths collected through the end of December as well as general management interest. While anglers are asked to measure fish rounding up to the nearest ¼", as can be seen in the figure, most anglers provided information by inch bins rather than ¼" bins. However, these figures are still informative regarding whether releases are regulatory or not.

The majority of drawn assignments occurred on weekend days (62%) compared to weekdays (38%)(Table 5). The total number was split almost evenly between the time intervals of 8am-2pm (47%) and 11am-5pm (53%) with the highest percentage of assignments drawn for the 11am-5pm interval at a single site (22%). Overall, there were more assignments with only one site selected per day (63%) than two sites per day (37%). However, the percent of assignments at one site per day varied amongst states ranging from 48% to 96% with the majority having only around 50% drawn assignments at one site per day (Table 6).

The most successful kind of day and time interval for distributed cards was weekend days from 8am-2pm (1,086, 50%)(Table 5). There were twice as many cards distributed during single site assignments (1,493, 69%) compared to two site assignment days (668, 31%). Distribution rates were highest during the 8am-2pm interval, across both site cluster types, with 7.2 cards per day for assignments with 2 sites and 6.7 cards per day for assignments with only 1 site (Table 7). Weekend days from 8am-2pm were also the most successful kind of day and time interval for returned cards (198, 42%) followed closely by weekend 11am-5pm assignments (158, 34%). Return rates were highest for single site assignments, across both intervals, with 1.4 cards returned during 8am-2pm at a single site and 1.3 cards returned during 11am-5pm intervals at a single site (Table 7). The average number of assignments from May to October was 78 assignments per month (Table 8). June was the most productive month for cards distributed (526) and returned (119).

Average productivity across all states for catch card assignments was 6.2 intercepts per assignment (Table 9). This is slightly lower than the same interval and site group average productivity for 2025 (6.5) and the 2020-2024 average (7.0). We observed a similar rate of percent eligible anglers intercepted during catch card assignments (58%) compared to averages for the same interval and site group from 2020 to 2025 (57%) (Table 10).

Anglers were able to report their discarded fish either by entering them individually, with or without lengths, in the length box or by tallying them in the tally box at the bottom of the card. Of the 286 cards with release data reported, 231 (81%) only used the length box, 19 (7%) only used the tally box, and 36 (12%) recorded data in both the length and tally boxes. Of the 267 catch cards that included lengths in the length box, only 7 (2.6%) had 20 or more lengths reported indicating that the design of the catch card with 20 lines of data was adequate for most anglers, aligning with our preliminary analysis used in the catch card design.

One hypothesis of this project was that anglers may report more species released in the catch card project than in the Access Point Angler Intercept Survey (APAIS) interviews. With the APAIS interviews, anglers are asked to recall what species of fish they released and may accidentally omit some. With the catch card, anglers were asked to record the species of fish they released while fishing which should improve accuracy. The catch card project collected a smaller percentage of cards reporting no released fish than sampled in the APAIS (Figure 3). While there were similar percentages of anglers reporting either one or two species of fish released between the two surveys, a greater percentage of anglers reported three to five species of fish as compared to the APAIS.

Another topic of interest was whether the catch cards would result in less digit bias. In the APAIS, anglers again may not remember exactly how many fish they released when asked after their fishing trips. This often shows up in the survey data with numbers rounded to either the 5 or 10 digit values (i.e. 10, 15, 20, 25, etc.). It was hoped that by allowing anglers to record the exact number of fish released while fishing that this digit bias would be reduced. The percentage of anglers reporting 1, 2, or 3 total

fish released was fairly similar between the MRIP and catch card surveys (Figure 4). Differences were more notable when four or more fish were released alive. A greater percentage of trips reported releasing 4, 5, 7, 8, 9, and 11 fish on the catch cards than is usually reported in the APAIS. Of note was that the lower percentage of anglers reporting releasing 10, 15, and 20 fish on the catch cards as compared to the MRIP intercepts.

This same analysis as above was done to compare the number of fish released between the catch card and MRIP surveys for the same six species (Black Sea Bass, Summer Flounder, Scup, Spotted Seatrout, Striped Bass and Red Drum) that had the most lengths collected to see if the same results were obtained as when summing across all species released (Figure 5). For species like Black Sea Bass, Summer Flounder, and Scup where more fish data were submitted, similar reductions in digit bias were observed generally for the 5, 10, and 15 numbers of fish released. Unlike when looking at the total number of fish released across species, however, the catch cards appeared to collect higher percentages of anglers reporting just 1 or 2 fish released at the species level. This may be due to anglers who release more fish not wanting to take the time to record lengths and/or tallies for all of them. While some differences were noted for Spotted Seatrout, Striped Bass, and Red Drum at the smaller numbers of releases, conclusions were harder to draw for the largest numbers of releases due to the limited data in the tail of the release distributions. It is possible that a larger number of catch card assignments and returned cards could fill out these release distributions more fully than what we were able to obtain with the relatively small number of pilot catch card assignments.

Budget Expenditures

Funds for the 2025 pilot project were added to the existing MRIP budget and fully utilized for the printing of cards, pre-paid postage for each card, purchasing of writing utensils, measuring tapes, and outreach materials for anglers, and the successful completion of overdrawn APAIS assignments where cards were handed out.

Discussion

Consultations with stock assessment scientists during project development suggested a minimum of 30 discard lengths per year. We established a goal of 60 lengths per year for the most commonly encountered species in each region (North Atlantic, Mid-Atlantic, and South Atlantic), which would allow for potential biannual length composition to be developed for use in stock assessments. We predicted that the most commonly encountered species for this project would be Black Sea Bass, Striped Bass, and Tautog in the North Atlantic (Connecticut, Massachusetts, and Rhode Island), Black Sea Bass, Striped Bass, Summer Flounder, and Tautog in the Mid-Atlantic (Maryland and New York), and Black Sea Bass, Red Drum, and Spotted Seatrout in the South Atlantic (North Carolina, South Carolina, and Georgia). In the North Atlantic, this goal was met for Black Sea Bass (180 discard lengths reported) and Tautog (71 discard lengths reported) but fell short for Striped Bass (40 discard lengths reported). This goal was met for Summer Flounder in the Mid-Atlantic with 67 discard lengths reported but fell short for Black Sea Bass (23 discard lengths reported), Striped Bass (14 discard lengths reported), and Tautog (20 discard lengths reported). In the South Atlantic, this goal was met for Red Drum (127 discard lengths reported) and Spotted Seatrout (69 discard lengths reported) and was short of the goal for Black Sea Bass (38 discard lengths reported). Future discussions with MRIP are needed regarding the number of lengths required to develop statistically valid expanded discard length frequencies as is currently done with the harvested fish lengths collected by APAIS. However, these data for the more frequently encountered fish may still be useful to stock assessors and managers at the current sample sizes, especially if they can be pooled across regions.

The majority of assignments were drawn on weekend days (62%) with the highest proportion drawn on weekends during the 11am-5pm peak interval at a single site (22%). Across weekends and weekdays, more assignments were drawn from 11am-5pm (53%) than the 8am-2pm interval (47%). Even though 8am-2pm intervals accounted for only 47% of drawn assignments, they were the most productive timeframe for distributing cards (58%). This was expected given the determination in the proposal stage that 78% of anglers begin their trip between 6am and 12pm.

In the proposal, we had predicted we would distribute an average of 5.24 cards per assignment. Distribution rates varied between states with an average of 4.65 cards distributed per assignment. As predicted, the most successful combination of day and time interval for distributing cards was weekend days from 8am-2pm. Surprisingly, on weekdays the 11am-5pm interval was more productive for distributing cards (282) than 8am-2pm (163). The majority of those cards on weekdays from 11am-5pm (197) were distributed during one site cluster days. These were typically higher pressure sites which had more anglers present on site, which likely explains the higher success rate of cards distributed. It's also possible that adding in the buffer period before the assignment had a positive effect on the probability of encountering anglers departing prior to the 11am-5pm interval. There is not consistent enough information on the length of buffer periods used in this first year to say with certainty if more cards were handed out during the buffer period than the assignment during the first year of this study. A refined approach to identifying buffer periods in 2026 will help answer this more definitively in the future.

We had estimated a return rate of 25% based on a previous project in Connecticut and achieved an annual return rate of 21%. Weekend days for both 8am-2pm and 11am-5pm seemed almost equally successful. Similarly to cards distributed, there were more cards returned on weekdays from 11am-5pm (76) than 8am-2pm (35). This is likely explained by the fact that more anglers end their fishing trip in the 11am-5pm interval than the 8am-2pm interval. For card returns, intervals seemed to play less of a role and the number of sites for an assignment was more influential. The number of cards returned was about equal for the 8am-2pm interval (233) versus the 11am-5pm interval (234). However, single site assignments were far more successful for card returns (358) compared to two site assignments (109). Both 8am-2pm and 11am-5pm at a single site were about equally productive, accounting for 29% and 30% of returned cards, respectively. As shown in results, the majority of returns (66%) were handed directly to the field interviewer. Remaining at one site for the entire duration of the day increased the chance of encountering anglers when they returned from fishing, thereby increasing the success of cards being returned.

While limited sample sizes in the catch card project made it difficult to definitively determine whether or not the catch cards improved recall as compared to the APAIS, it did seem that a greater proportion of anglers in the catch card pilot did report higher numbers of species released (3+) when compared to the APAIS. In addition, when the total number of releases were pooled across species or were examined for species reported more frequently on catch cards (i.e. Black Sea Bass, Summer Flounder, Scup), it did seem that the catch cards reduced the rounding biases often seen in the APAIS intercept data. In the future, it would be important to increase the number of catch cards returned with length data to improve the length frequency data, making them more usable for stock assessments and management, as well as to better define the distribution of numbers of fish released by anglers, especially to fill out the tail of the distribution more.

We observed lower productivity for catch card assignments (6.2 intercepts/assignments) than the 2025 APAIS productivity and the average APAIS productivity over the past five years, 6.5 and 7.0 respectively.

However, this is not necessarily an indicator that catch cards caused the lower productivity and is more likely an artifact of more 8am-2pm catch card assignments (~50%) compared to a typical APAIS draw (~30%) that are known to be less productive for intercepts. The ability to maintain a similar percent of eligible anglers intercepted for catch card assignments (58%) compared to past five years (57%) could be further evidence that cards were not interfering in the field interviewer's ability to obtain as many intercepts as possible. This is assuming that everyone is just as vigilant at counting anglers while juggling both interviewing and handing out cards as they would be on a normal APAIS assignment. The higher percent of 8am-2pm catch card assignments could be a contributing factor to successfully interviewing more anglers, since at lower pressure sites it's typically easier to interview more anglers. For example, if the site is busy there is an increased chance for multiple boats to end their fishing trip at the same time, and since it is difficult to intercept multiple boats at once, additional angler counts would increase the number of eligible anglers present on site and cause a decrease in percent intercepted. Whereas if at a lower pressure or slower site, anglers may end their trips at more evenly distributed or staggered times throughout the day leaving more time to interview all anglers (i.e., fewer counts and more intercepts).

In this pilot project we were trying to maximize both the collection of intercepts as well as the distribution and collection of catch cards. As shown above, distinct and differing strategies (targeted kind of day, intervals and number of sites per assignment) were needed to successfully achieve each objective. Weekends in general were far more productive for card distribution and returns. The 8am-2pm interval was more successful for card distribution. Both time intervals were about equally successful for card returns if at a single site all day. Even though respectable catch card return rates were observed in 2025 (~21%), the total number of returned cards and number of lengths were inadequate to conduct a robust analysis. A focus on methodologies that maximize card distribution and returns will likely lead to more cards returned, and subsequently more species lengths submitted. Likewise, we expect similar increases in the number of catch cards returned and lengths submitted by increasing the number of catch card assignments conducted.

Each state conducted between 5 to 11 catch card assignments per month which on average is around 10% of the total assignments completed each month per state. Due to the overdrawn nature of the catch card assignments, states were conservative in how many additional assignments they could complete for the pilot project. If the catch card assignments could be added as a supplementary component of the APAIS sampling, it is possible that a greater number of catch card assignments could be completed which could increase the number of catch cards handed out and returned, assuming the return rates remain stable in future years.

Ultimately, based on data currently available, catch cards did not seem to interfere with regular duties of an APAIS sampler. If assigned strategically, catch card components could be a complementary addition to regular APAIS assignments. For example, adding catch card duties on a weekend assignment during the 8am-2pm intervals, or more preferably combination of 8am-2pm time intervals and single site assignments, would maximize card distribution and returns without jeopardizing ability to intercept anglers. Likewise for weekday assignments, it may be more beneficial to only add a catch card component to 11am to 5pm intervals on single site assignment days.

Additional analysis of existing APAIS unavailable catch with catch card releases will be conducted at the conclusion of the 2026 catch card season. Recommendations, potentially via peer review, for potential inclusion of catch card methodology into the existing APAIS, or some subsample of APAIS assignments, is expected. An additional goal of the MRIP review is analysis of intercept data collected during overdrawn catch card APAIS assignments from 2025 to determine if they can be utilized in the final estimation

process, likely in late Spring, 2026. Preliminary analyses in this report suggested that the catch cards could 1) be more accurate regarding the number of species caught and 2) reduce digit bias when anglers are asked to track releases before their fishing trip, when compared to existing APAIS methodology, which only asks these questions after the trip is completed. Future analysis using more data could be used to improve our understanding on this topic. Follow up work could also be done to compare the discard length frequencies collected in this project to those already used in stock assessments such as volunteer angler logbooks and tagging datasets. Additionally, the scalability of the number of catch cards and the subsequent lengths of important species could be used to identify meaningful levels of inclusion of catch card methodology to the existing APAIS.

Plan for 2026

Most of the pilot states from 2025 have agreed to participate in a second year of this pilot project in 2026. While South Carolina will not be participating in 2026, Delaware will be joining the project. In addition, several methodology changes are planned, or currently being utilized, for 2026. Georgia opted to expand the number of sampling months starting in March 2026. All states will have the option for a buffer period before or after the assignment (possibly both) to test if having a buffer afterward can increase card returns. Some states are limiting catch card assignments to only 8am-2pm intervals to test if that improves card distribution or return rates. While single site assignment days are clearly very productive for catch card returns, we are unable to force catch card assignments to occur at only one site without risk of constraining the APAIS sample frame and jeopardizing use of intercepts collected while on catch card assignments. We will focus on streamlining the ability to survey field interviewers in 2026 to continue assessing if there is any negative impact of including catch cards on an APAIS assignment. This survey would be standardized to include questions such as how many anglers refused the survey because of the catch card, general impressions on how the card was received by anglers, time it takes to explain the catch card, how many anglers were missed because of explaining the catch card to other anglers, or conversely how many anglers missed receiving a card because of interviewing a group of anglers. We also plan to compare data collected via catch cards to existing headboat and dockside sampling or other data sources (i.e. volunteer anglers surveys, tagging data, etc.) for select species.

Milestone Chart 2026

Date	Event
Mar, 2026	Overdrawn assignment allocation request to MRIP, GA sampling begins
Apr, 2026	Training sessions for pilot states, order supplies, ship to states
May, 2026	Remaining pilot state conduct begins
Jun 15, 2026	Deadline for card data entry and data review for May
Jun, 2026	Pilot Partner Meeting – check in on process
Jul 15, 2026	Deadline for card data entry and data review for Jun
Jul, 2026	Pilot Partner Meeting – Wave review (May-Jun)
Aug 15, 2026	Deadline for card data entry and data review for Jul
Aug, 2026	Pilot Partner Meeting – Mid Season review (May to July)
Sep 15, 2026	Deadline for card data entry and data review for Aug
Sep, 2026	Pilot Partner Meeting – Wave review (Jul-Aug)

Oct 15, 2026	Deadline for card data entry and data review for Sep
Nov 15, 2026	Deadline for card data entry and data review for Oct
Nov, 2026	Pilot Partner Meeting – Wave review (Sep-Oct)
Dec 15, 2025	Deadline for card data entry and full year data review
Jan 1, 2027	Data available for analysis

Tables and Figures

Table 2. Basic metrics of catch card assignments by state and overall. Data for May-December 2025.

State	Year	Number of Completed Catch Card Assignments	Number of Eligible Anglers on Catch Card Assignments	Number of Completed Interviews on Catch Card Assignments	Number of Catch Cards Handed Out	Number of Catch Cards Entered	Number of Lengths Submitted	Number of Catch Cards Handed Out Per Assignment	Catch Card Return Rate (%)	Number of Lengths Per Catch Card
Massachusetts	2025	60	781	186	95	30	92	1.58	31.58	3.07
Rhode Island	2025	69	577	342	170	50	240	2.46	29.41	4.80
Connecticut	2025	66	591	492	258	72	185	3.91	27.91	2.57
New York	2025	63	273	141	245	56	175	3.89	22.86	3.13
Maryland	2025	65	661	422	446	75	77	6.86	16.82	1.03
North Carolina	2025	48	1,230	479	210	35	107	4.38	16.67	3.06
South Carolina	2025	49	656	445	308	55	184	6.29	17.86	3.35
Georgia	2025	50	468	325	453	94	266	9.06	20.75	2.83
Total	**2025**	**470**	**5,237**	**2,832**	**2,185**	**467**	**1,326**	**4.65**	**21.37**	**2.84**

Table 3. Number of lengths submitted on the catch cards for selected species. A total of 1,326 lengths were submitted overall. Most recorded lengths were for Black Sea Bass, Scup, Summer Flounder and Red Drum. Data collected May-December 2025.

Species	Number of Lengths
Atlantic Croaker	44
Black Drum	5
Black Sea Bass	241
Bluefish	29
Cobia	1
Red Drum	127
Red Snapper	5
Scup	149
Sheepshead	34
Spanish Mackerel	2
Spot	11
Spotted Seatrout	75
Striped Bass	55
Summer Flounder	134
Tautog	91

Table 4. Depth recorded on catch cards by state

STATE	AVERAGE DEPTH (FT)	MINIMUM DEPTH (FT)	MAXIMUM DEPTH (FT)
CT	23.3	1	60
GA	7.9	1	45
MD	16.8	2	75
MA	17.0	5	30
NY	20.7	3	60
NC	17.9	5	70
RI	30.8	10	75
SC	8.3	2	28
ALL	16.7	1	75

Table 5. Number and proportion of catch card assignments drawn, cards distributed and cards returned by kind of day (KOD), Interval, and number of sites per day for all states combined.

	WD		WE		WD		WE		WD		WE	
	Assign.	Proportion	Assgn.	Proportion	Distributed	Proportion	Distributed	Proportion	Return	Proportion	Return	Proportion
	B:8AM-2PM											
2 SITE	36	7%	57	12%	83	4%	413	19%	13	3%	61	13%
1 SITE	32	7%	101	21%	80	4%	673	31%	22	5%	137	29%
ALL	*68*	*14%*	*158*	*33%*	*163*	*8%*	***1086***	***50%***	*35*	*7%*	***198***	***42%***
	P:11AM-5PM											
2 SITE	51	11%	36	7%	85	4%	87	4%	17	4%	18	4%
1 SITE	64	13%	108	22%	197	9%	543	25%	59	13%	140	30%
ALL	*115*	*24%*	*144*	*30%*	***282***	***13%***	*630*	*29%*	***76***	***16%***	*158*	*34%*
TOTAL	***183***	***38%***	***302***	***62%***	***445***	***21%***	***1716***	***79%***	***111***	***24%***	***356***	***76%***

Table 6. Number of catch card assignments by time interval and number of sites per day for each state.

	B:8AM-2PM	P:11AM-5PM	Total	Proportion
CT				
2 SITE	15	15	30	40%
1 SITE	22	23	45	**60%**
GA				
2 SITE	18	8	26	**52%**
1 SITE	2	22	24	48%
MD				
2 SITE	11	18	29	45%
1 SITE	18	18	36	**55%**
MA				
2 SITE	14	9	23	38%
1 SITE	16	21	37	**62%**
NY				
2 SITE	17	17	34	**52%**
1 SITE	18	13	31	48%
NC				
2 SITE	9	4	13	26%
1 SITE	11	26	37	**74%**
RI				
2 SITE	9	14	23	33%
1 SITE	25	22	47	**67%**
SC				
2 SITE		2	2	4%
1 SITE	21	27	48	**96%**

Table 7. Card distribution and return rates for cards by kind of day, interval and number of sites per assignment for all states.

	Avg cards distributed		Avg cards returned	
	WD	WE	WD	WE
B:8AM-2PM				
2 SITE	2.3	**7.2**	0.4	1.1
1 SITE	2.5	6.7	0.7	**1.4**
P:11AM-5PM				
2 SITE	1.7	2.4	0.3	0.5
1 SITE	3.1	5.0	0.9	1.3

Table 8. Number of assignments drawn, cards distributed and returned by number of sites and intervals each month across all states.

	# Sites	Interval	5	6	7	8	9	10	11	12	ALL
Assignments	2 SITE	B:8AM-2PM	15	18	7	11	21	17	2	2	93
		P:11AM-5PM	18	11	5	15	15	17	4	2	87
	1 SITE	B:8AM-2PM	19	18	29	29	16	19	3		133
		P:11AM-5PM	24	32	36	25	27	24	4		**172**
	TOTAL		*76*	*79*	*77*	*80*	*79*	*77*	*13*	*4*	*485*
Cards Distributed	2 SITE	B:8AM-2PM	76	159	21	80	71	44	25	20	496
		P:11AM-5PM	22	35	6	17	25	12	33	22	172
	1 SITE	B:8AM-2PM	80	168	160	124	79	104	38		**753**
		P:11AM-5PM	128	164	126	93	122	73	34		740
	TOTAL		*306*	*526*	*313*	*314*	*297*	*233*	*130*	*42*	*2161*
Cards Returned	2 SITE	B:8AM-2PM	8	31	6	12	14	0	1	2	74
		P:11AM-5PM	5	6	1	2	9	3	6	3	35
	1 SITE	B:8AM-2PM	22	35	23	29	26	24	0		159
		P:11AM-5PM	30	47	23	25	44	27	3		**199**
	TOTAL		*65*	*119*	*53*	*68*	*93*	*54*	*10*	*5*	*467*

Table 9. Productivity for catch card assignments (CC) compared to 8am-2pm and 11am-5pm PR site group assignments from 2020 to 2024 and 2025. The table includes all states along the coast.

Waves 3-5 Productivity			
STATE	2020-2024 AVG	2025	2025_CC
ME	6.6	6.5	
NH	6.5	4.9	
MA	5.8	6.1	3.1
RI	7.3	8.9	5.0
CT	9.2	6.4	7.5
NY	5.8	5.9	2.2
NJ	4.1	4.0	
DE	5.2	5.2	
MD	7.4	6.3	6.5
VA	4.1	4.8	
NC	10.1	7.6	10.0
SC	10.3	10.4	9.1
GA	8.4	6.9	6.5
AVG	7.0	6.5	6.2

Table 10. Percent eligible anglers interviewed during catch card assignments (CC) compared to 8am-2pm and 11am-5pm PR site group assignments from 2020 to 2024 and 2025. The table includes all states along the coast.

Waves 3-5 Eligible Angler			
STATE	2020-2024 AVG	2025	2025_CC
ME	59%	49%	
NH	70%	56%	
MA	53%	51%	24%
RI	55%	51%	59%
CT	81%	86%	83%
NY	60%	64%	52%
NJ	48%	56%	
DE	44%	49%	
MD	53%	60%	64%
VA	44%	54%	
NC	53%	42%	39%
SC	59%	61%	69%
GA	65%	65%	72%
AVG	57%	57%	58%

Figure 1. Example final catch card for the 2025 pilot catch card project.

For detailed instructions, scan the QR Code:

12345678 Control # _____ Site # _____

Only record YOUR released fish on this trip, not the entire fishing group.

Primary Targeted Fish: _____ Fishing From: ☐ Boat ☐ Shore

Average Depth Fished (ft): _____ Hours Fished to Nearest 1/2 Hour: _____

Area Fished: ☐ Inshore (Bay, Sound, River) ☐ Ocean <3 Miles ☐ Ocean >3 Miles

Trip End Time (Return to Shore): _____ ☐ AM ☐ PM

I DID NOT RELEASE ANY FISH TODAY ☐

List every fish RELEASED on this trip and its condition with Y for Alive or N for Not Alive.
Only measure released fish that have a size or bag limit.
Record total length rounded up to the nearest 1/4 inch. →

	Released Fish Species Name	Alive? (Y/N)	Total Length
1			
2			
3			
4			
5			
6			
7			
8			
9			
10			
11			
12			
13			
14			
15			
16			
17			
18			
19			
20			

Counts of released fish NOT listed above

Released Fish Species Name	# Released Alive	# Released Dead

Return this postage paid card in the mail or take a picture and send to [cards@state.gov]

Figure 2. Raw length frequencies as collected from the pilot discard catch card project through December 2025, all states, modes (private/rental boat and shore), and areas (inland and ocean) combined. Note the different scales of the x- and y-axes. While most x-axes show ¼" bins, striped bass and red drum are shown with ½" bins due to the wide range of release lengths.

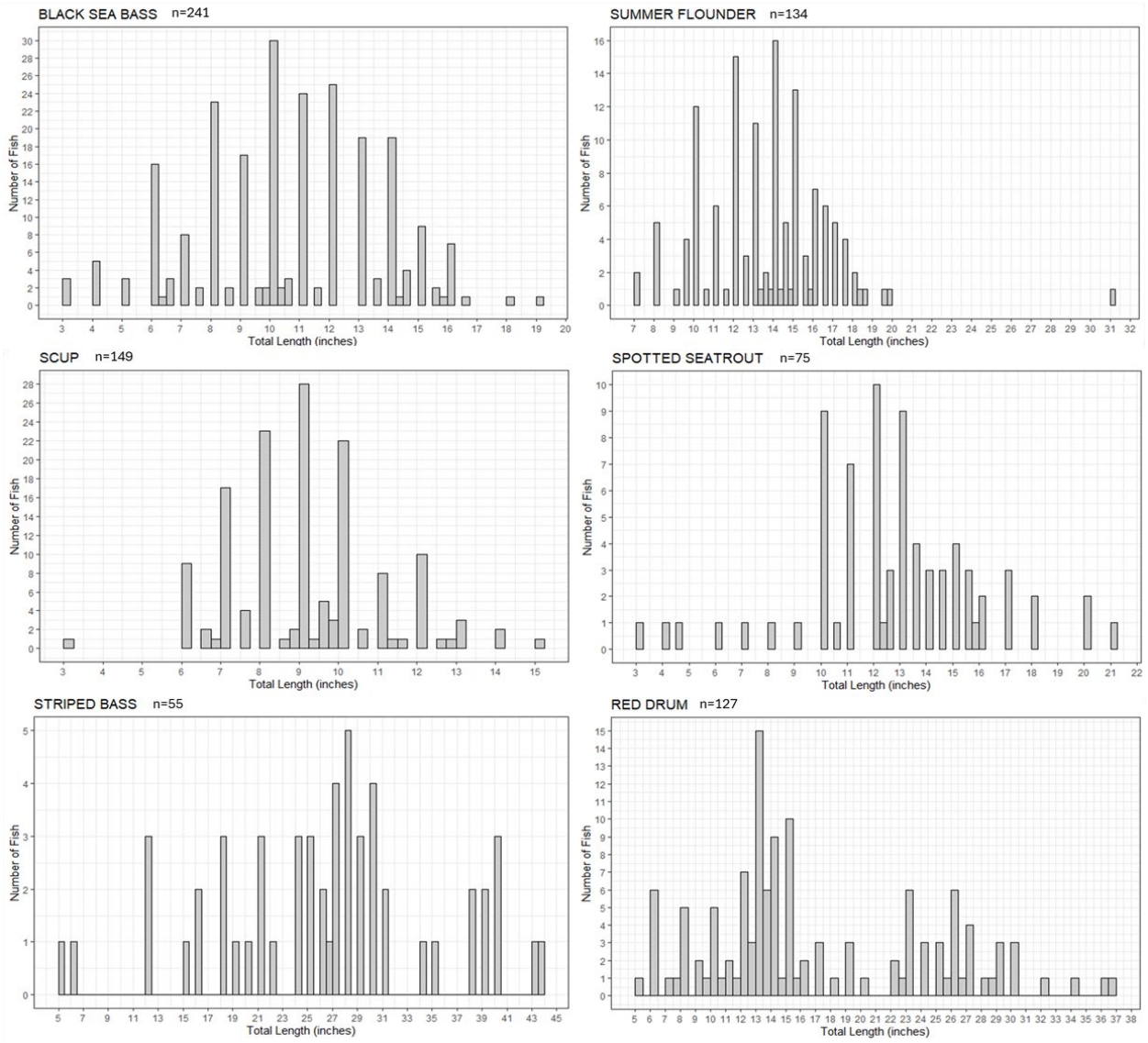


Figure 3. The number of species anglers reported releasing alive from MRIP public intercept data as compared to the pilot catch cards. Data from all catch card pilot states in waves 3-5 were used in the analysis from the private/rental boat and shore modes and all areas.

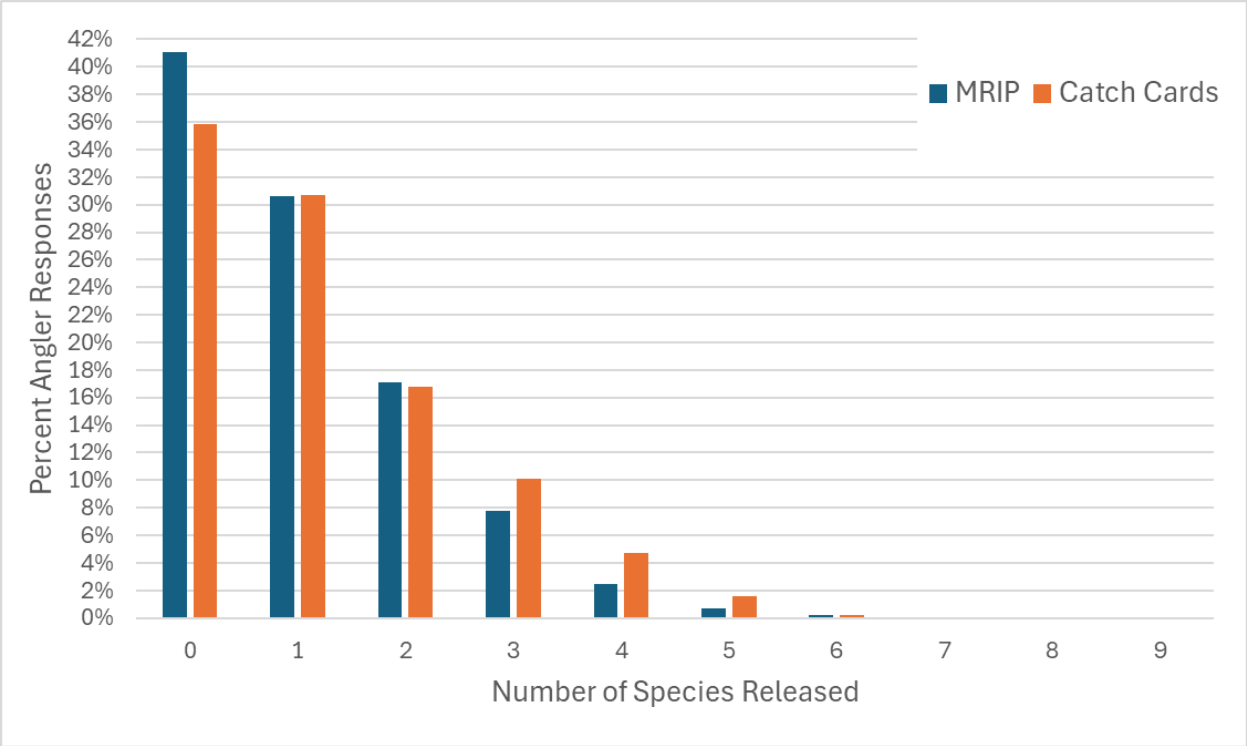


Figure 4. The number of fish across all species anglers reported releasing alive from MRIP public intercept data as compared to the pilot catch cards. Data from all catch card pilot states in waves 3-5 were used in the analysis from the private/rental boat and shore modes and all areas.

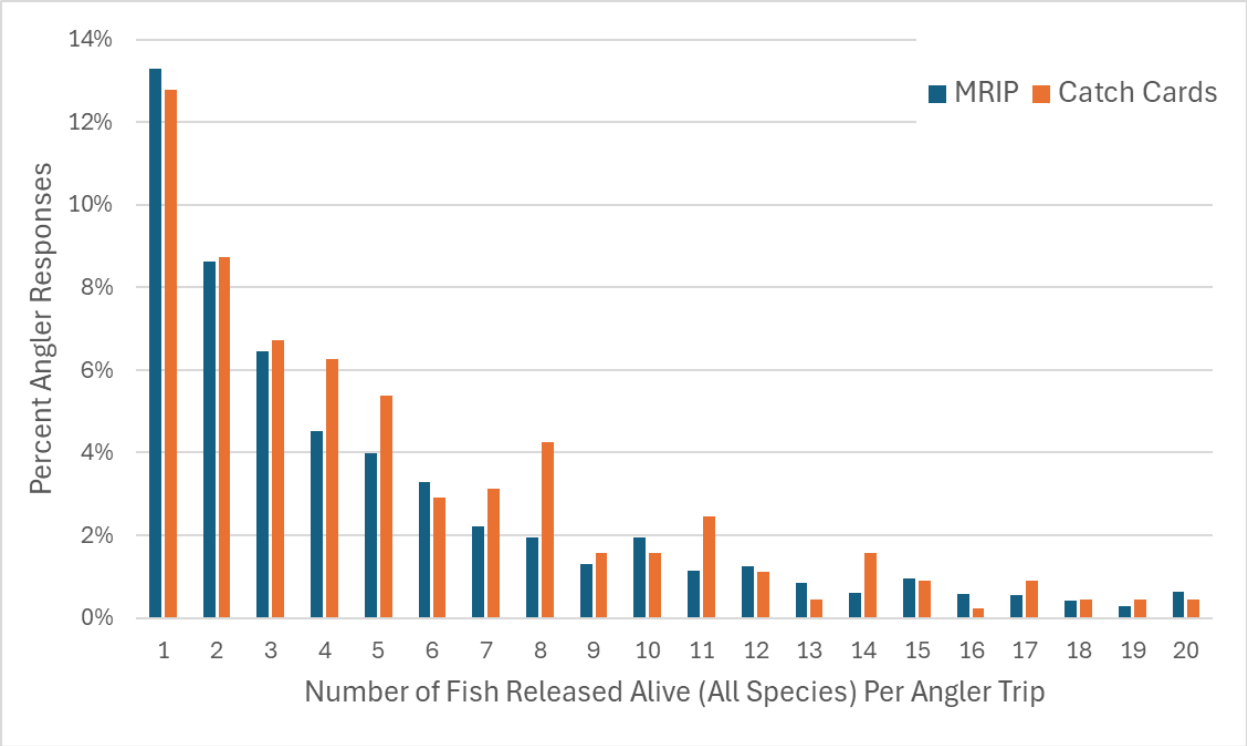
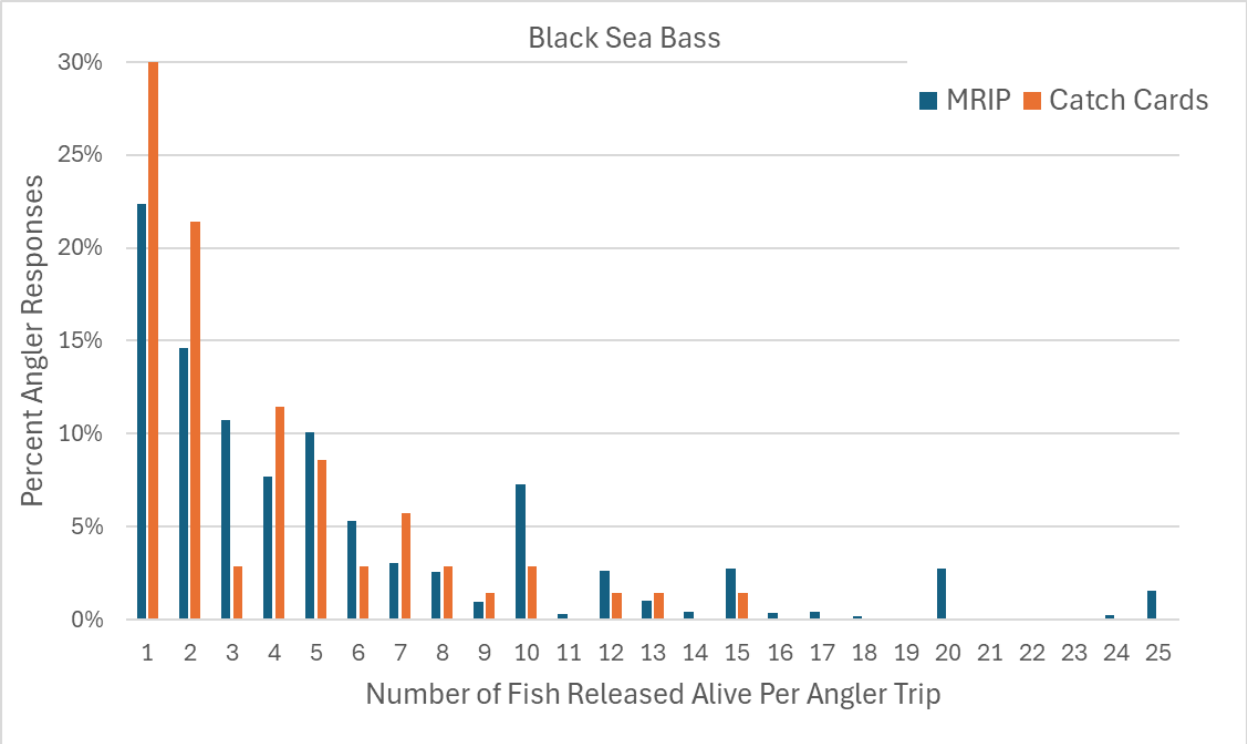
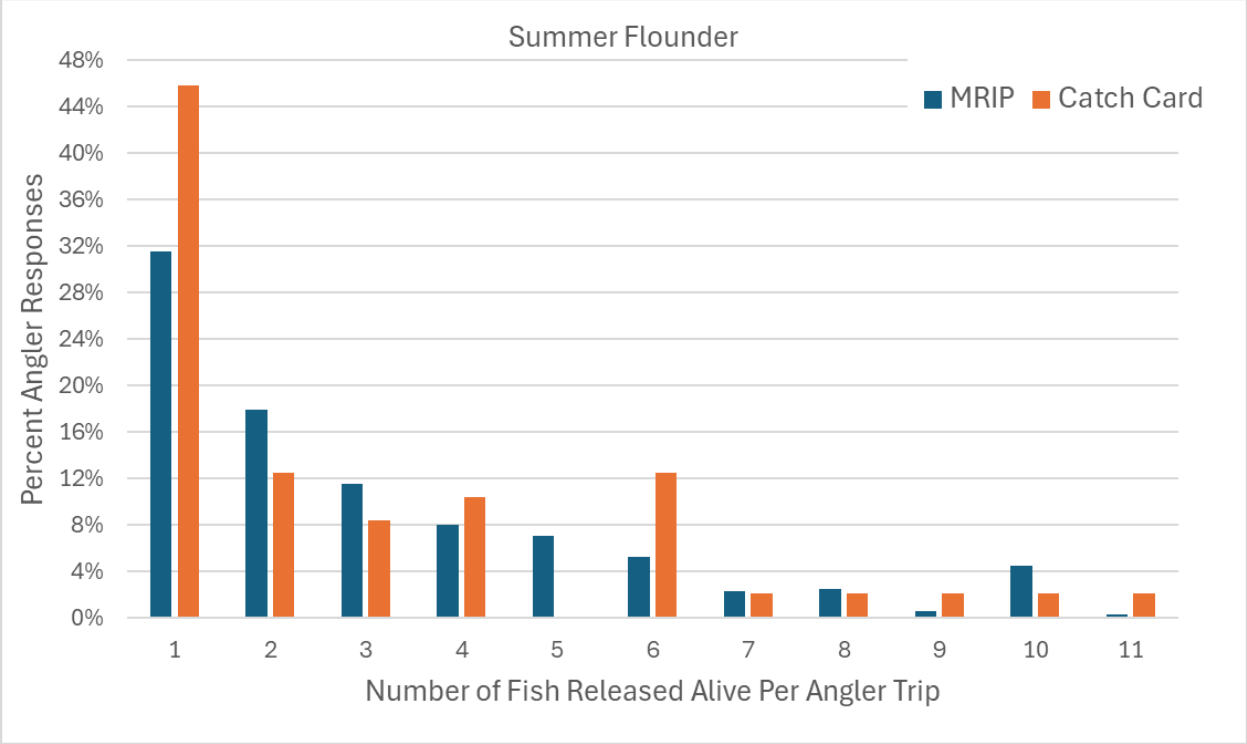
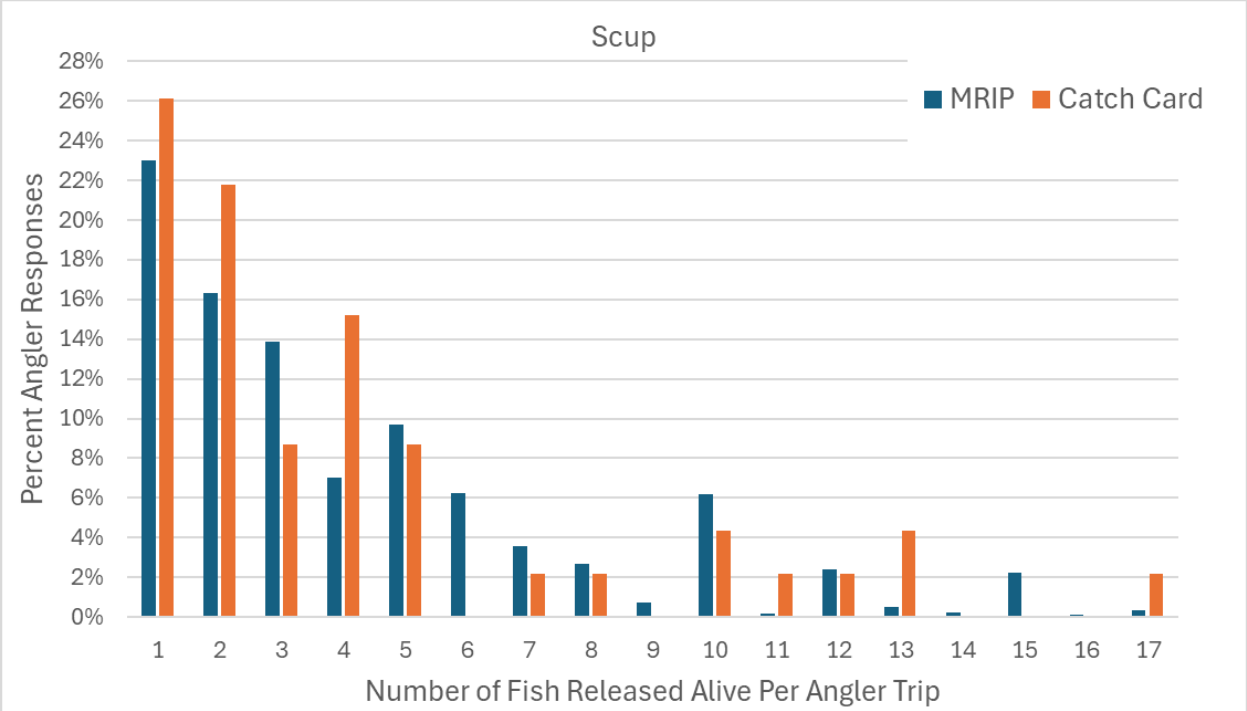
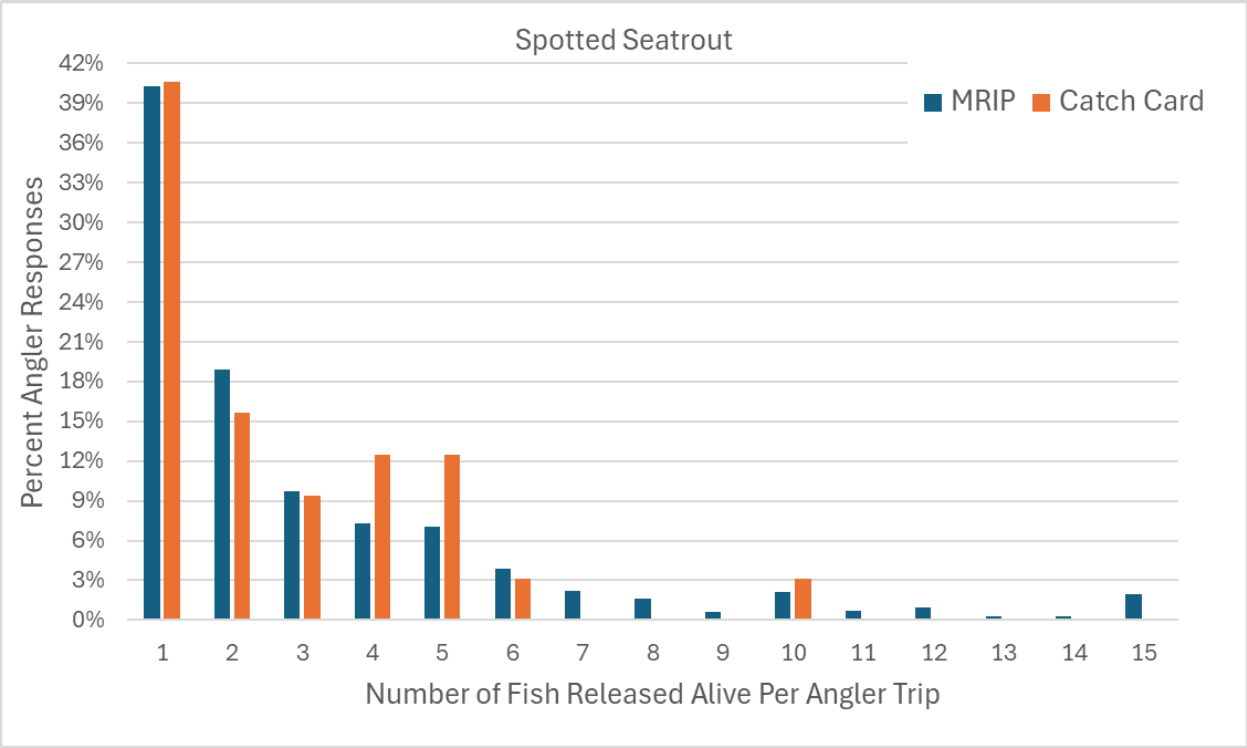


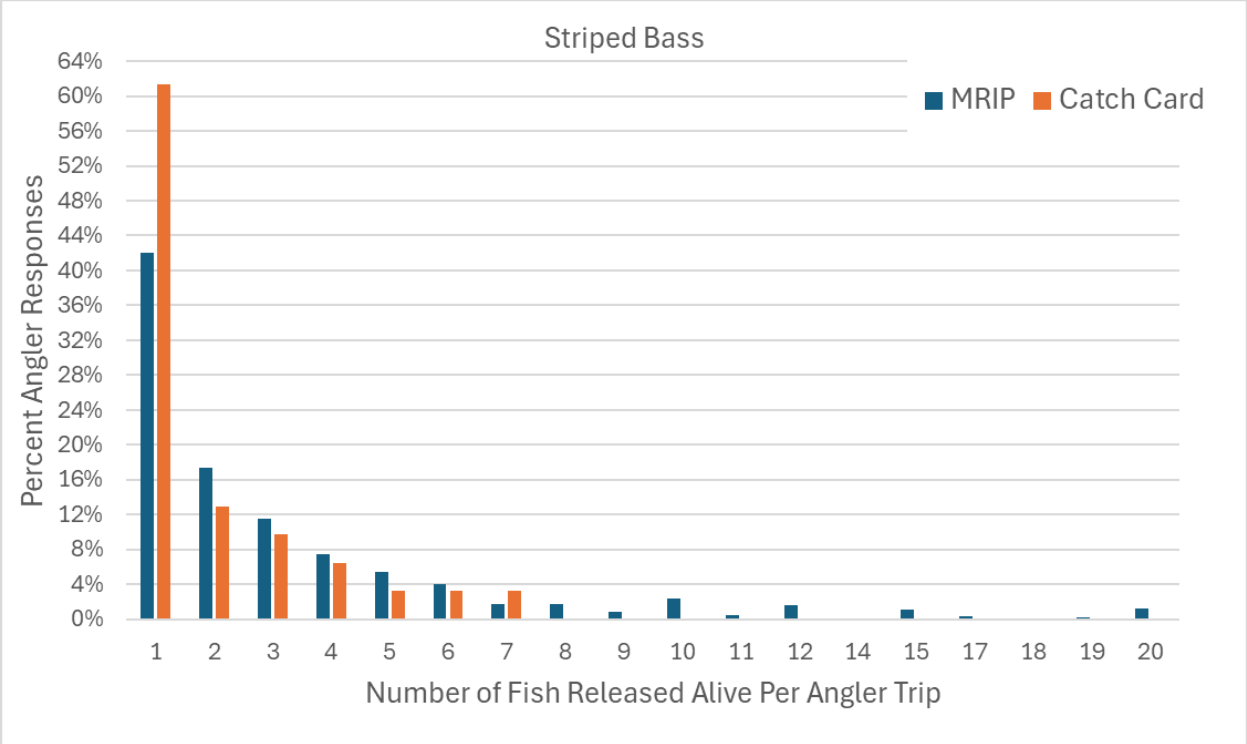
Figure 5. The number of fish anglers reported releasing alive from MRIP public intercept data as compared to the pilot catch cards for select species (Black Sea Bass, Summer Flounder, Scup, Spotted Seatrout, Striped Bass, and Red Drum). Data from all catch card pilot states in waves 3-5 were used in the analysis from the private/rental boat and shore modes and all areas. Note the different scales on the x- and y-axes.

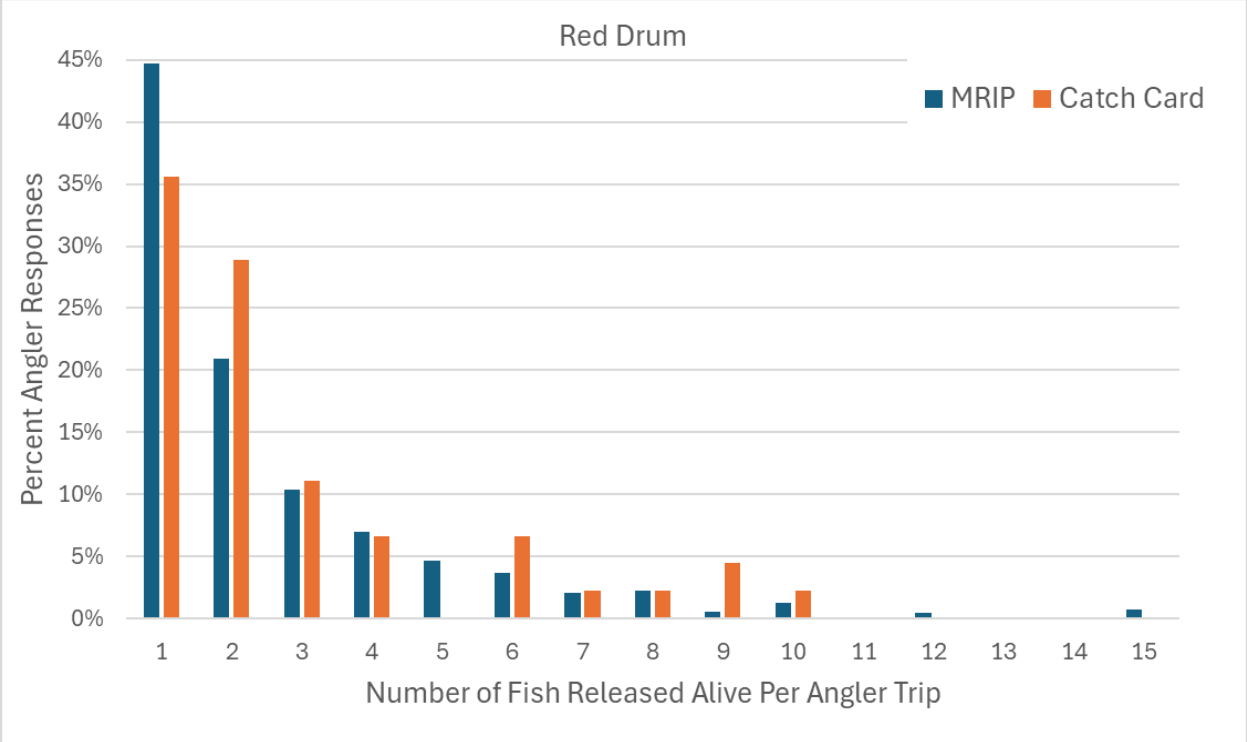





Scup
MRIP
Catch Card
Percent Angler Responses
28%
26%
24%
22%
20%
18%
16%
14%
12%
10%
8%
6%
4%
2%
0%
1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17
Number of Fish Released Alive Per Angler Trip


Spotted Seatrout
MRIP
Catch Card
Percent Angler Responses
42%
39%
36%
33%
30%
27%
24%
21%
18%
15%
12%
9%
6%
3%
0%
1 2 3 4 5 6 7 8 9 10 11 12 13 14 15
Number of Fish Released Alive Per Angler Trip


Striped Bass
MRIP
Catch Card
Percent Angler Responses
64%
60%
56%
52%
48%
44%
40%
36%
32%
28%
24%
20%
16%
12%
8%
4%
0%
1 2 3 4 5 6 7 8 9 10 11 12 14 15 17 18 19 20
Number of Fish Released Alive Per Angler Trip


Red Drum
MRIP
Catch Card
Percent Angler Responses
45%
40%
35%
30%
25%
20%
15%
10%
5%
0%
1 2 3 4 5 6 7 8 9 10 11 12 13 14 15
Number of Fish Released Alive Per Angler Trip