



Atlantic States Marine Fisheries Commission

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Striped Bass Technical Committee and Stock Assessment Subcommittee Meeting Summary

Webinar
September 22, 2022

Technical Committee and Stock Assessment Subcommittee Members:

Nicole Lengyel Costa (TC Chair, RI), Mike Celestino (SAS Chair, NJ), Michael Brown (ME), Kevin Sullivan (NH), Gary Nelson (MA), Kurt Gottschall (CT), Caitlin Craig (NY), Brendan Harrison (NJ), Tyler Grabowski (PA), Margaret Conroy (DE), Alexei Sharov (MD), Luke Lyon (DC), Ingrid Braun (PRFC), Joshua McGilly (VA), Brooke Lowman (VA), Hank Liao (VA), Charlton Godwin (NC), Steve Minkinen (USFWS), John Sweka (USFWS)

ASMFC Staff: Katie Drew, Emilie Franke

Public: Charles Witek, Michael Quinan, Zachary Schuller, David Sikorski, Mike Waine, Willy Goldsmith, Jessica Best, Jesse Hornstein, Tony Friedrich, Max Appelman

The Striped Bass Technical Committee (TC) and Stock Assessment Subcommittee (SAS) met via webinar on September 22, 2022 to discuss the 2022 stock assessment update report, discuss fishery-dependent sampling for the commercial fishery, and receive an update on Draft Addendum I.

Selectivity and Retrospective Adjustment for 2022 Stock Assessment Update

Following the TC-SAS discussion on August 10, 2022 regarding initial stock assessment model runs, TC-SAS members provided input via an online survey to indicate which selectivity blocks for 2020-2021 should be used in the base model run. Seven members voted for the “new 2020-21 selectivity block for Bay and Ocean” base run; five members voted for the “new 2020-21 selectivity block for Ocean only” base run. There was minimal difference between the new Ocean/Bay block scenario and the new ocean only block scenario, with both sets of projections indicating no reduction is needed to rebuild the stock. Zero members voted for the “no new selectivity blocks” base run. Four members wanted to discuss further or defer to other TC-SAS members. All three selectivity scenarios resulted in the same stock status determination.

After reviewing the survey results and further discussion on the webinar, the TC-SAS finalized their decision to use the new 2020-21 selectivity blocks for both the ocean and the Chesapeake Bay to account for the Addendum VI regulation changes implemented in 2020 in both regions.

TC-SAS members also provided input via the online survey regarding bias correction (i.e., retrospective adjustment) for F and SSB estimates. The TC-SAS agreed to use the “retrospective adjustment” terminology to be consistent with terminology used in other stock assessments.

The retrospectively adjusted F and SSB estimates are within the 90% confidence intervals of the unadjusted estimates; per guidance from the Northeast Fishery Science Center (NEFSC), retrospective adjustment is not necessary in this situation. Ten members voted to not use retrospective adjustment; zero members voted to use retrospective adjustment; and six members wanted to discuss further or defer to other TC-SAS members.

After reviewing the survey results, the TC-SAS finalized their decision that retrospective adjustment was not necessary and follows the NEFSC guidance.

Draft Assessment Report

Prior to the webinar, TC-SAS members provided edits and comments on a first draft of the 2022 Assessment Update report. During the September webinar, K. Drew reviewed key findings from the report and reviewed questions from TC-SAS members. The TC-SAS agreed to the following additional report edits:

- Add text to the report noting the methods for calculating the biological reference points (e.g., using the geometric mean of F) and the projections are the same methods used in the 2018 benchmark stock assessment. Details on those peer-reviewed methods are available in the 2018 report.
- Add text near the beginning of the report noting that F in this report means the fishing mortality rate per year (ensure the time step is clear).
- Add reference point values in millions of pounds to the executive summary reference point table (suggestion from public comment).
- Consider additional text/clarification in the recruitment section indicating how the recent low year classes will contribute to SSB after 2029, which is beyond this assessment's short-term projections (suggestion from public comment).

The final assessment report will be available as part of the Striped Bass Management Board meeting materials for the November meeting. The TC-SAS then discussed anticipated questions and discussion points that are likely to come up during the assessment discussion with the Board:

- It is important to highlight the probability of stock rebuilding by 2029. If F increases, the probability of rebuilding the stock decreases.
- The projections assume constant fishing mortality over time and assume the same level of effort over time.
- Some increase in catch is okay to expect as the population recovers to maintain constant F . It is important to monitor catch levels each year, and FMP Reviews over the next few years could compare realized removals to the assumed removals in the projections.
- The 2024 stock assessment update is an important check-in point incorporating two more years of data to update the rebuilding projections. The benchmark is scheduled for 2027, and depending on catch levels, an additional update in 2026 could be scheduled.

- Regarding current regulations, the Board should consider its risk tolerance: based on the results of this assessment and the projected probability of rebuilding, is the Board comfortable maintaining status quo until the 2024 assessment provides another update?

The TC-SAS also noted questions about potential changes in angler behavior and age structure of the catch as the stock recovers and anglers potentially encounter increased numbers of bigger fish. Additionally, the TC-SAS discussed the difficulty of quantifying the impact of the circle hook requirement on release mortality, and the need to further discuss the recreational release mortality rate during the next benchmark assessment.

In response to questions from the public, the TC-SAS noted the following:

- The SSB reference points decreased relative to the 2018 assessment due to updated SSB time series estimates, resulting in a lower 1995 SSB estimate and therefore a lower SSB threshold and target.
- The projected recovery of the stock is likely driven by a reduction in F and above average year classes (2011, 2015, 2018) contributing to SSB in the years leading up to the 2029 rebuilding target. The recent low 2019- and 2020-year classes (i.e., 2020 and 2021 age-1 recruits) will start contributing to SSB in 2027 and 2028 as those fish approach full maturity. Since those fish will not be mature until the end of the 2029 rebuilding projections, those recent low year classes may have more impact on SSB beyond the current rebuilding projections.

Commercial Fishery-Dependent Sampling

The Potomac River Fisheries Commission (PRFC) requested guidance from the TC-SAS on what level of fishery-dependent sampling for their commercial fishery is appropriate. PRFC is evaluating current sampling protocols and costs; they currently purchase striped bass from one dealer and send those fish to the Virginia Institute of Marine Science (VIMS) for processing (length, sex, scale age).

The Striped Bass FMP only provides general guidance on sampling, noting samples should be representative of location and seasonal distribution of catch, and appropriate biological data shall be collected (include size and sex composition). Other ASMFC-managed species have specific sampling requirements, but in many cases those requirements were developed due to a particular stock assessment gap, which is not the case for this request. The Striped Bass TC-SAS has not established required precision levels to inform required sampling size.

Recognizing the unique logistical and resource challenges for PRFC as a small staff, the TC-SAS provided the following guidance:

Short-term Guidance

- Consider increasing geographic variation for PRFC samples (fish from multiple dealers).
- PRFC could consult with Maryland DNR staff to discuss the potential of sampling at check stations (length, collect scales) without having to buy the fish.

- Some fish could be purchased for otolith ages, but otoliths would increase PRFC cost.
- PRFC could increase the number of length samples but only age a subset of those samples (instead of ageing all samples as is currently done).

Medium-/Long- term Guidance

- Conduct analysis to determine sample size based on a selected precision level.
 - G. Nelson noted [R packages](#) available for such analysis
 - H. Liao noted a VMRC [shiny app](#) available for such analysis
 - J. Sweka noted [Thompson 1987](#) as a method for determining sample size for multinomial proportions
- PRFC could consider jurisdiction-specific analysis, and the TC-SAS could consider a coastwide analysis with discussion of desired precision levels for all states.

Update on Draft Addendum I: Options for Commercial Quota Transfers

E. Franke provided an update on Draft Addendum I regarding commercial quota transfers. The draft addendum considers allowing voluntary commercial ocean quota transfers between states with commercial quota. The Plan Development Team (PDT) will meet in October to further develop options and discuss their concerns, which are similar to concerns first raised by the TC in 2014. The first concern is transfers could undermine current reductions because Addendum VI reductions were calculated assuming commercial fisheries perform as they have in the past (i.e., underutilize quotas to the same degree). The second concern is a pound of commercial quota is not equal across all states, as some states have adjusted their size limits resulting in changes to their respective quotas. After further development by the PDT, the Board will likely consider Draft Addendum I for public comment in November 2022 or February 2023.