

# Northeast Fisheries Observer Program

## *2016 Manual Updates*

### MANUAL STRUCTURE

Since 2001, the Observer Program Manual has remained relatively the same, while observer protocols, policies, methodology, and documentation have changed considerably. The increasing use of real-time electronic data collection combined with the intention to reduce paperwork will result in even more changes over the next several years. This update was intended to reformat the observer materials to be more relevant to the current observer and adaptable to future improvements, while still providing the necessary level of documentation for end-users.

The 2013 Observer Program Manual was split into two separate documents: the 2016 [Data Entry Manual](#) and the 2016 [Operations Manual](#). The 2013 Biological Sampling Manual and 2014 On Deck Reference Guides (laminated sheets) have been combined into a single [On Deck Reference Guide](#) printed on waterproof paper.

All manuals are also provided electronically in PDF format with clickable hyperlinks. Clicking on “see page 13” will bring you to page 13, clicking on “see Appendix B” will take you to Appendix B, etc.

#### **Data Entry Manual**

This manual contains instructions for completing all fields (paper or electronic) collected on an observed fishing trip. Unlike the previous Program Manuals in which the instructions were laid out in paragraph form, this version contains a table for each log, with individual data fields represented by rows in the table. For each field, the table provides the name of the field, the collection method (captain vs. observer, measured vs. calculated, etc.), the units of measurement and precision (whole pounds, to the nearest tenth of a foot, etc.), and the proper method for indicating an unknown value. All code lists were moved to appendices for quick reference.

As before, images of all logs are included, with a numbered version and an example version. We did not include a blank copy of the log; due to margin sizes, log images are shrunk from their true size and therefore cannot be photocopied out of the manual.

#### **Operations Manual**

This new manual focuses on the process of observing a trip with sections for trip selection, gear to bring, and communication/conflict resolution; fishery-specific information including definition of terms, safety concerns, sampling strategies, and common scenarios; protected species information; protocols for biological sampling; and catch estimation. Additional helpful information is provided throughout the document in side boxes, such as how a fishery is managed or how a type of data may be used. These do not affect data collection, but may help explain why data is collected in a particular way.

Where possible, images and figures were added or updated for clarity. Obviously not all situations could be described, so a “Notes” page follows each section. These pages can be used for organizing additional details learned via training and/or debriefings.

#### **On Deck Reference Guide**

This guide contains biological sampling targets, length and age structure collection, biological sampling of protected species, photos and descriptions of gear configurations by fishery, species verification requirements and brief ID guides, protected species ID guides, and specialized catch estimation strategies. The information has been organized into sections by use, rather than topic. For example, the Fixed Gear Components (weak links, anchors, etc.) appear near the Gillnet, Longline, and Pot/Trap priorities, rather than near the trawl gear information.

Biological sampling priorities were reorganized into lists (Priority 1, Priority 2, and Priority 3) rather than tables. If priorities for kept/discard or length frequency/age structure on a single species are variable, noted in parentheses. Maps were added to each listing, highlighting the specified statistical areas. A new priority pages specific to ASM trips was created, emphasizing that groundfish discards take priority over any others, even if it is not the highest priority listed.

### Code Lookup Sheet

A single laminated sheet contains all the current code values, excluding those that are printed on the logs themselves, and those that are too large or update frequently (port, dealer, vessel). This sheet does not contain codes that may have been used in the past but are not commonly used now, such as program codes that are not currently active, although these codes may be found in the [Data Entry Manual](#). This sheet is not hole-punched; it is expected that observers would store it in their clipboards along with their paperwork. This sheet will be updated as warranted, such as when new codes are created.

## LOG AND PROTOCOL CHANGES

### Vessel & Trip

- Updated to reflect the trip definition changes that were sent to all observers in December 2015, including the Transit Trip Log.

### Common Gear

- Created a section in the Data Entry Manual with instructions common to all Gear Logs, similar to the Common Haul Log section.

### Trawl Gears

- Common trawl gear fields are only listed once, under the Bottom Trawl gear section. Only additional fields are listed with their specific logs.
- Added an “unknown” checkbox for codend and liner hung fields.
- Added description of a new Large Mesh Belly Panel net (gear code 150) that may be observed in the small mesh fisheries to reduce bycatch of flatfish.

### Pair Trawl

- On the Pair and Single Mid-Water Trawl Gear Log, the “Weights” field was specified as “Total”, and terminology reminders were included in the comments box:
  - Codend = “Coversheet”
  - Liner = “Brailer”

### Scallop Dredge

- Protocols were added to the [Operations Manual](#) for situations involving grey meats and/or parasites. These changes are based on the memo that was sent to all scallop observers in January 2016.
- On the Scallop Dredge Gear Log, check boxes were added for turtle chain mat verification. These take the place of observers having to write out the comments. These should be marked “yes” or “no” based on the captain’s response; if a question was not asked, leave it blank and provide a comment explaining why it was not asked.
- On the Scallop Dredge Haul Log, a check box was added for the presence/absence of grey meats and/or parasites. As with the clappers observed box, the answer must match up with the species section, and if it does not, a comment must be provided explaining why not.

## Clam Dredge

- Detailed photographs were added to the Operations Manual, taken from recent observed trips.
- On the Clam Dredge Gear Log, fields were added for both port and starboard dredges (if used), similar to the Scallop Dredge Gear Log.
- Line drawings on the Gear Log were updated to reflect the dredge styles currently in use.

## Incidental Takes

- Updated the ASM Incidental Take Log to allow 10 animals per log instead of 1.
- Marine mammal additional biological samples reduced to:
  - Whiskers (seals only, 3 longest, frozen)
  - Blubber
  - Fetus (if aborted on deck)
- Added examples to the On Deck Reference Guide of dorsal fin photos that must be taken on all bottlenose dolphins.
- Blubber thickness for seals moved from mid-body ventral side to just above hip on dorsal side.
- Added pages to the On Deck Reference Guide for large whale interactions, and right whale or dead whale reporting information.
- Sea bird sampling no longer requires feather samples.
- Sea turtles added separate “videos to take” box to the On Deck Reference Guide.

## Biological Sampling

- Monkfish vertebrae no longer required, instead will be collecting the illicium (instructions on page 150 in the Operations Manual). Changed the age structure codes on the Length Frequency Log to allow this new code, which means all other codes changed from a single digit to 2 digits, mostly by adding a ‘0’ to the beginning (e.g., previous code ‘2’ should now be recorded as ‘02’).
- Changed bluefish, summer flounder, scup, and black seabass age structure requirement to otoliths instead of scales. Yellowtail flounder is the only fish that still requires scales.
- Added otolith requirement for red hake.
- Some priority rankings had minor changes – be sure to check your guide before/during all trips.

## Catch Estimation

- On the Catch Estimation Worksheet, changed “sorting method” from a single check box to a check all that apply; removed the combination option.
- Added 3 new estimation methods:
  - Trap Subsample (12) – sampling mixed catch from a subset of traps on a haul, and using that composition to extrapolate to the unsampled traps. This method has been recommended in the past (part of Strategy 3, see page 48 of the Operations Manual), but now has a unique estimation method. Only used in the Pot and Trap fisheries.
  - Count-to-Count (13) – using a ratio of total number of animals to number sampled to get a unitless multiplier, described on page 117 of the Operations Manual. Recommended for mixed skates that can be tallied but not individually identified.
  - Weight-to-Weight (14) – using a ratio of actual total weight to actual weight sampled to get a unitless multiplier, described on page 117 of the Operations Manual. Recommended for conch or other small species that are time-consuming to distinguish, but for which a total actual weight is possible.

- On the Catch Estimation Worksheet, added additional fields for subsampling using the above methods, or using volume-to-volume with counts of baskets or totes (such as Strategy 2 for conveyor belts).
- On the Catch Estimation Worksheet, replaced Marel Scale Fit Value with Marel Scale Calibration Weight. This is a better indicator of scale performance.

### Catch Composition

- Updated protocols for dumping baskets in the situation where you have run out of baskets before pumping ends. The previous manual said to dump every odd-numbered basket; you should be dumping every **even**-numbered basket, thereby always retaining basket #1.

### Discard Log

- Added a new field to capture “complete sampling” when part of the catch is pumped to another vessel. To answer “yes”, any catch that is brought to your vessel must be completely brought onboard **and** fully sampled by you. Any slipped catch by your boat will require a “no” in this field. As always, operational discards do not count as slippage. This field is unaffected by the activity of the other boat (i.e., if the other boat has slipped catch, you may still record “yes” as long as your boat does not slip catch and you fully sample the catch to your boat). This gives a better indicator to the end-users of completeness of unobserved hauls.

### Crustacean Sampling

- Added 4 new egg stages for pot/trap certified observers (see pages 157-159 of the [Operations Manual](#) for descriptions and photos).
  - Along with the new egg stages is a requirement to submit at least one photo per trip of each egg stage encountered (e.g., if you observe both newly extruded and hatching eggs, you must submit at least one photo of newly extruded and one photo of hatching).
  - All other observers (not pot/trap certified) should continue to mark only Yes (unstaged), No, or Unknown for the egg code. If you wish to attempt to stage the eggs, you must provide photographs for verification.

### Marel Scale

- Included the Marel Scale Worksheet (formerly “Marel Scale Log”) in the [Data Entry Manual](#) as it is an official worksheet and part of the required log packet. Reformatted the design to be consistent with other logs and worksheets, but the data collected is unchanged.
- As a reminder, Marel Scale Worksheets are required for **every** trip while you are issued a Marel scale, even if you do not use it on that trip.

### Photo Verification

- Added a list of photos that are required on every trip (in addition to the quarterly SVP requirements), listed on page 54 of the [On Deck Reference Guide](#):
  - High volume and herring trips: all herrings and mackerel
  - Scallop trips: yellowtail flounder, both dredges
  - Lobster trips: egg stages (new)
  - Any unknown fish (“fish NK”); also submit a physical sample if possible
  - Animals with shark or marine mammal depredation (new)