

# NORTH CAROLINA DIVISION OF MARINE FISHERIES

## Recreational Data Collection Programs

April 21, 2012



# Coastal Angling Program

- Implemented in 2009
- License funding
- All recreational data collection programs
- NC recreational fisheries too dynamic for one survey to cover all fisheries
- Fisheries Reform Act 1997
  - FMPs require comprehensive data



# Coastal Angling Program

## Includes:

- MRIP (Marine Recreational Information Program)
- CSMA (Central Southern Management Area)
- FHS (For-Hire Survey)
- HMS (Catch Card) census all HMS species landed
- Pier Survey (census all pier trips, logs)
- Mail Surveys (flounder gigging, shellfish, special)



# Coastal Angling Program

## MRIP (Marine Recreational Information Program)

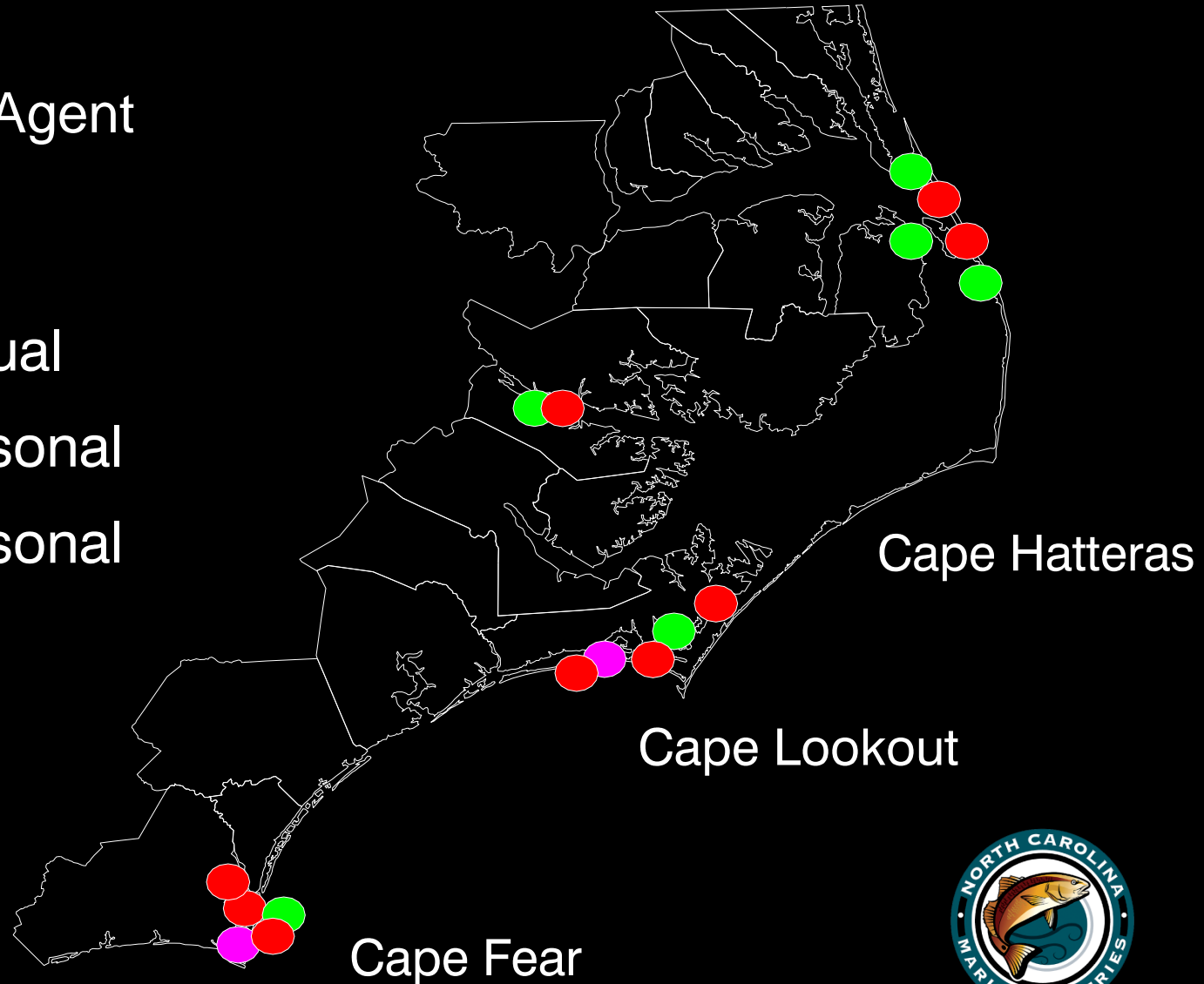
- Coastal and estuarine statewide survey
- Primary survey used to estimate catch and effort
- Two surveys conducted in concert
  - Effort (number angler trip, phone calls)
    - Random
    - Angler License Directory
  - Catch (average catch per trip, dockside)
    - Dockside Interviews



# Coastal Angling Program

## MRIP Port Agent Distribution

- 40 hr Annual
- 40 hr Seasonal
- 20 hr Seasonal



# Coastal Angling Program

## Calculating Estimates with MRIP Survey

STEP 1. Calculate Total Number of Trips

- a. Random Telephone
- b. Angler License Frame

STEP 2. Calculate Mean Catch per Trip

- a. Angler Interviews

STEP 3. Calculate Estimate

- a. Total Trips \* Mean Catch per Trip = **Total Catch**



# Coastal Angling Program

## CSMA (Central Southern Management Area)

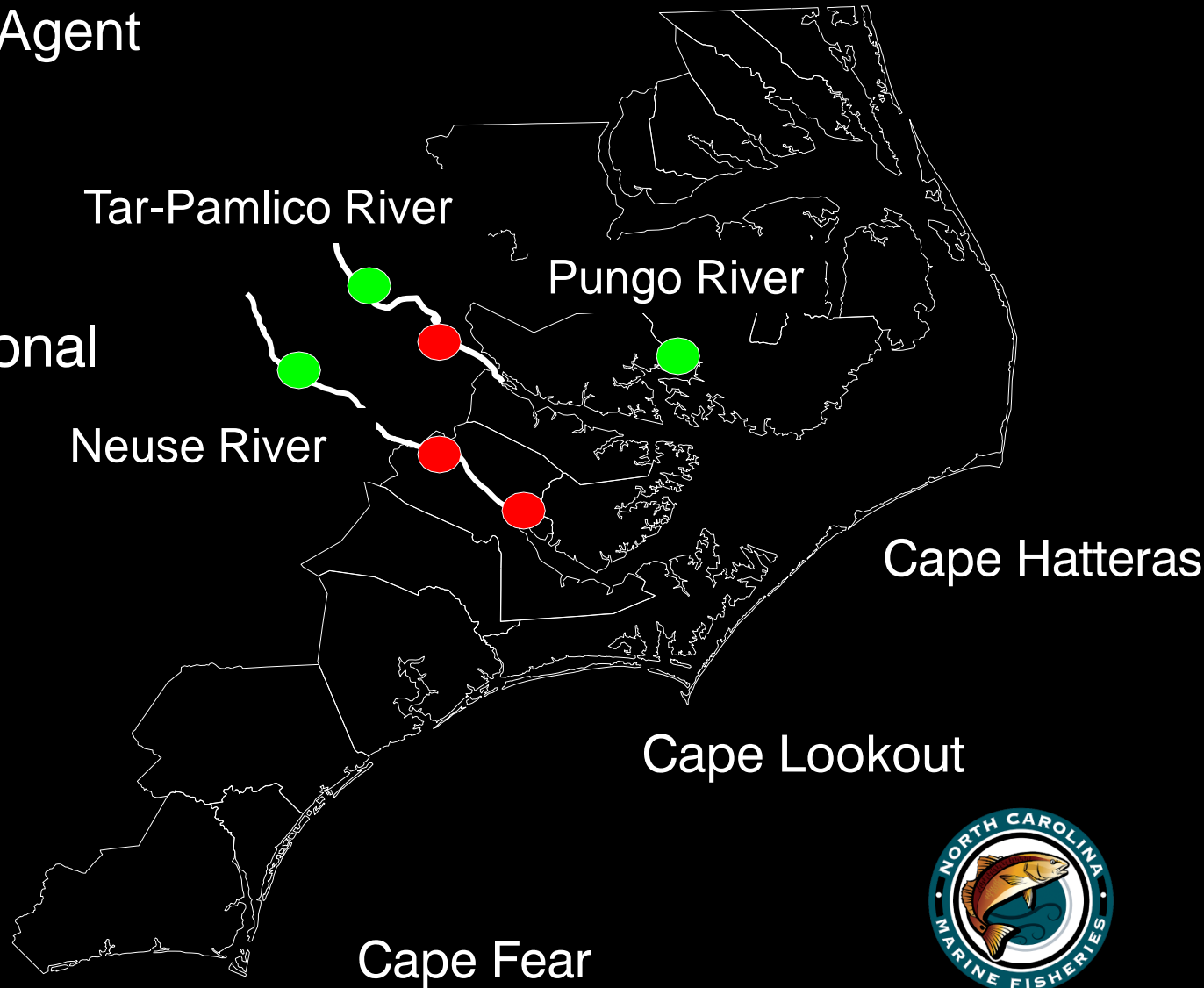
- Upper estuarine survey (2004)
  - Neuse/Trent , Tar/Pamlico and Pungo Rivers
- Access Probability based Survey
- Effort and Catch based on intercepts and sampling probabilities
- Same methodology as Roanoke and Albemarle Sound



# Coastal Angling Program

CSMA Port Agent  
Distribution

● 40 hr Seasonal





# Coastal Angling Program

## Calculating Estimates with CSMA Survey

STEP 1. Calculate Total Number of Trips and Catch

a. By Zone and Day Type

STEP 2. Expand Number of Trips and Catch from Days Sampled to Total Available Days in Sample Period (month, year, etc)



# Coastal Angling Program

## FHS (For-hire Survey)

- Coastwide
- Part of MRIP
- Phone survey
  - 10% of for-hire fleet each week
  - Effort survey only
- Validation of trips (self-reported data)



# Coastal Angling Program

## Calculating Trip Estimates for FHS

### STEP 1. Calculate Total Number of Trips

- a. Telephone 10% of Fleet Each Week
- b. Expand Survey Results to Entire Fleet



# Coastal Angling Program

## HMS (Highly Migratory Species)

- Rare Event Species
- Census of HMS landed
  - Bluefin tuna and Billfish
- Catch cards and carcass tags
  - Reporting stations
  - Must be tagged before landed
  - Must complete catch card to get tag



# Coastal Angling Program



## NC Highly Migratory Species Catch Card NOT FOR COMMERCIAL Reporting Station Copy



Date  Year  Month  Day

Reporting Station \_\_\_\_\_

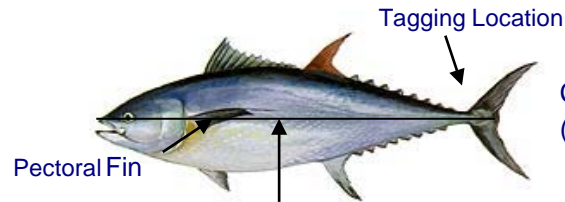
Permit Number \_\_\_\_\_

Vessel Name \_\_\_\_\_

Trip Type (check one) Charter   
Private   
Headboat

Tournament  Yes  
 No

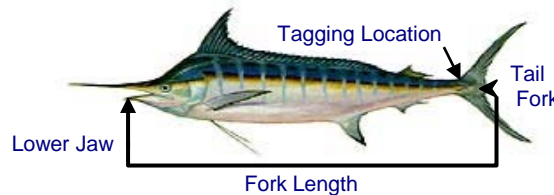
Tag Number \_\_\_\_\_  
(obtained at reporting station)



Curved Fork Length Measurement

Bluefin tuna should be measured from the tip of upper jaw, over the top side of the pectoral fin to the fork of the tail.

Curved Fork Length (inches) \_\_\_\_\_  
Pounds (optional) \_\_\_\_\_



Fork Length

Billfishes should be measured from the tip of the lower jaw to middle of the fork of the caudal (tail) fin.

Fork Length (inches) (any billfish species) \_\_\_\_\_  
Pounds (optional) \_\_\_\_\_



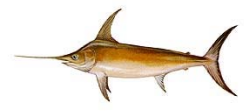
Blue Marlin



White Marlin



Sailfish



Swordfish

All the above Highly Migratory Species (HMS) landed in North Carolina must have a Landing Tag affixed before removal from the vessel. Tags are available at all LPS Reporting Stations. To obtain a Landing Tag, Captains or operators of permitted vessel must complete and submit a catch card for every HMS landed. This information collection is approved under OMB Control #0648-0328 (expires 09/30/2010).

# Coastal Angling Program

## Electronic Reporting System

- Alternative platform for participating in surveys
- Ease and Accessibility
- Online angler journal

[NCRECFISH.COM](http://NCRECFISH.COM)



# Coastal Angling Program

## Pier Survey (census)

- National Angler Registry (exemption criteria)
- Pier owners complete log each week
- Monthly reports
  - Mailed
  - Entered online



# Coastal Angling Program

## North Carolina Division of Marine Fisheries

### Monthly Fishing Pier Participation Log

PIER NAME				LICENSE NUMBER		
MONTH <b>SEPTEMBER</b>				YEAR <b>2012</b>		
SUNDAY	MONDAY	TUESDAY	WEDNESDAY	THURSDAY	FRIDAY	SATURDAY
						1 Report Number of Anglers Below
2 Report Number of Anglers Below	3 Report Number of Anglers Below	4 Report Number of Anglers Below	5 Report Number of Anglers Below	6 Report Number of Anglers Below	7 Report Number of Anglers Below	8 Report Number of Anglers Below
9 Report Number of Anglers Below	10 Report Number of Anglers Below	11 Report Number of Anglers Below	12 Report Number of Anglers Below	13 Report Number of Anglers Below	14 Report Number of Anglers Below	15 Report Number of Anglers Below
16 Report Number of Anglers Below	17 Report Number of Anglers Below	18 Report Number of Anglers Below	19 Report Number of Anglers Below	20 Report Number of Anglers Below	21 Report Number of Anglers Below	22 Report Number of Anglers Below
23 Report Number of Anglers Below	24 Report Number of Anglers Below	25 Report Number of Anglers Below	26 Report Number of Anglers Below	27 Report Number of Anglers Below	28 Report Number of Anglers Below	29 Report Number of Anglers Below
30 Report Number of Anglers Below						

OWNER/MANAGER SIGNATURE:

\_\_\_\_\_

DATE PREPARED:

/ /

MONTH DAY YEAR





# Coastal Angling Program

## Use license frame (CRFL)

- Mail/Telephone angler effort surveys
- Socioeconomic surveys
- Panel survey (public versus private access)
- Data requests
- Mail surveys of non-angling activities



Questions?

