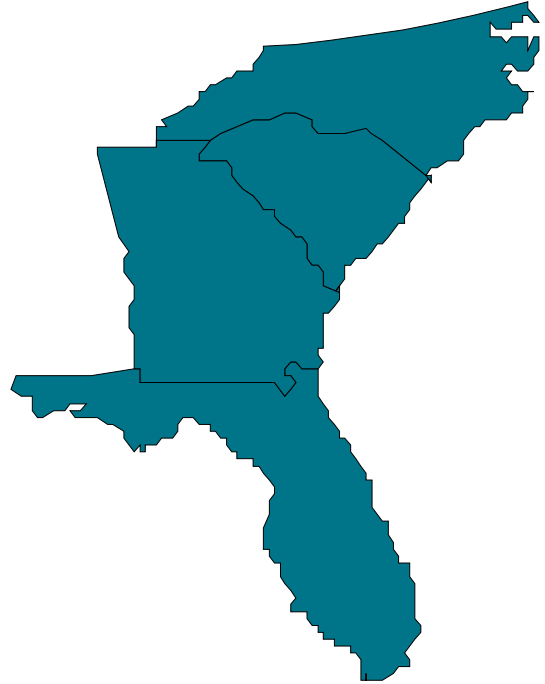


South Atlantic

- East Florida
- Georgia
- North Carolina
- South Carolina



South Atlantic Summary

Management Context

The South Atlantic region includes the states of Georgia, North Carolina, and South Carolina, and eastern Florida. Federal fisheries in this region are managed by the South Atlantic Fishery Management Council (SAFMC) and the National Marine Fisheries Service under ten fishery management plans (FMPs). The spiny lobster fishery, coastal migratory pelagics fishery, and the coral, coral reef, and live/hard bottom habitats are managed with the Gulf of Mexico Fishery Management Council (GMFMC). The Dolphin Wahoo FMP is managed jointly with the Mid-Atlantic Fishery Management Council (MAFMC) and GMFMC.

South Atlantic Fishery Management Plans

1. Coastal Migratory Pelagic Resources (with GMFMC)
2. Coral, Coral Reef, and Live/Hard Bottom Habitats (with GMFMC)
3. Dolphin Wahoo (with MAFMC and NEFMC)
4. Golden Crab
5. Habitat Plan (basis for a Fishery Ecosystem Plan)
6. Pelagic Sargassum Habitat
7. Shrimp
8. Snapper Grouper
9. Spiny Lobster (with GMFMC)
10. Red Drum

Of the species covered in these fishery management plans, pink shrimp, snowy grouper, black sea bass, red porgy, and red snapper are currently considered overfished. Species currently subject to overfishing include vermillion snapper, red snapper, snowy grouper, tilefish, red grouper, black sea bass, gag, black grouper, speckled hind, warsaw grouper, and red drum.

The South Atlantic wreckfish fishery is managed as an individual fishing quota (IFQ) fishery. This limited access privilege program (LAPP) was put into place in 1992 and had an ex-vessel value of \$300,000 in 2007. A snapper-grouper IFQ program is anticipated for 2010.

Commercial Fisheries

In 2006, South Atlantic commercial fishermen received \$141 million for their harvest (116 million pounds). The ex-vessel value of shellfish landings (64 million pounds) was \$80 million with shrimp and blue crab accounting for 47% of total landings revenue. Landings of finfish and other fishery products (52 million pounds) had an ex-vessel value of \$61 million. The commercial fishing industry had the highest sales, income, and employment impacts in Florida (note that this is the entire state, not eastern Florida): \$5.2 billion in sales, \$2.9 billion in income, and 103,000 jobs.



Edwin S. Taylor Fishing Pier at Folly Beach, South Carolina

Key South Atlantic Commercial Species

Commercially-important species and species groups in the South Atlantic include: clams, blue crab, flounders, groupers, king mackerel, oysters, shrimp, snappers, swordfish, and tunas.

Economic Impacts

Overall, Florida led the region in commercial fisheries-related sales and income, and full- and part-time jobs. Georgia and North Carolina both generated in-state sales of over \$500 million. The commercial fishing industry generated \$89 million in sales in South Carolina. Florida and North Carolina led the region in landings revenue at \$192 million and \$70 million, respectively.

Landings Revenue

Overall, ex-vessel revenue decreased 37% from 1997 to 2006 (-47% after adjusting for inflation), largely due to the decrease in ex-vessel revenue from shellfish (-45% nominally, -54% in real terms). Ex-vessel revenue from finfish and other fishery products declined 22% (-34% in real terms). North Carolina had the highest average landing revenue (\$90 million nominally, \$96 million in real terms), followed by east Florida (\$42 million nominally, \$45 million in real terms), South Carolina (\$24 million nominally, \$26 million in real terms), and Georgia (\$18 million nominally, \$19 million in real terms). All four states experienced declines in ex-vessel revenue during this period: Georgia at -58%, South Carolina at -48%, North Carolina at -36%, and east Florida at -14%.

The ten key species or species groups were on average 78% of ex-vessel value in the South Atlantic, with shrimp and blue crab accounting for 31% and 24% of average annual total landings revenue, respectively. However,

landings revenue for both species decreased between 1997 and 2006, dropping 46% for shrimp to \$40 million and blue crab landings revenue dropping 48% to \$27 million. East Florida's harvest of shrimp accounted for an average of 31% of the region's landings revenue from this species, ranging from 19% in 1997 to 41% in 2006. North Carolina generated the majority of blue crab revenues, on average accounting for 73% of the South Atlantic's landings revenue from this species.

Commercial Fish Facts

- All four states in the South Atlantic region list clams, blue crab, groupers, shrimp, and snappers as key species or species groups.

Landings revenue

- On average, the key species or species groups accounted for 78% of the total revenue.
- Shrimp and blue crab accounted for 71% of the average annual revenue for all key species combined.
- The largest annual increase during the 10 year period was 109% for tunas (1999-2000).
- Shrimp had the largest annual decrease in revenue, declining 37% from 2000-2001.

Landings

- On average, the key individual species or species groups accounted for 49% of total landings.
- Blue crab averaged over 54 million pounds from 1997-2006. This species contributed an average of 46% of all finfish and other fishery landings.
- Landings for tunas increased 50% from 2005-2006, the largest increase in landings in the 10 year period, averaging 1.7 million pounds.
- Shrimp had the largest annual decrease in landings, declining 37% from 2004-2005, and averaging 25.7 million pounds.

Prices

- Clams, oysters, swordfish, and groupers had the highest average annual prices per pound at \$6.95, \$4.06, \$2.66, and \$2.49, respectively.
- Blue crab, king mackerel, flounders, and tunas had the lowest average annual prices per pound at \$0.82, \$1.62, \$1.76, and \$1.79, respectively.
- The largest annual increase in ex-vessel price was 52% for tunas (1997-1998). Tunas also experienced the largest annual decrease in price (-20%) the following year.

In contrast to the declines in blue crab and shrimp revenues, landings revenue for oysters and tunas increased 118% and 117%, respectively, for a combined net gain of \$4.6 million from 1997 to 2006.

Landings

Over the 10 year period, total landings averaged 203 billion pounds, ranging from a low of 116 million in 2006 to a high of \$301 million in 1997; a 62% decrease between

these years. Landing of finfish and other fishery products decreased 75%, averaging 118 million pounds. Shellfish landings decreased 42%, averaging 85 million pounds.

Overall, the landings of all four states in the South Atlantic region decreased between 1997 and 2006, dropping 18% in east Florida, 39% in South Carolina, 43% in Georgia, and 70% in North Carolina. However, landings of some species increased between 1997 and 2006: Spanish mackerel (39%) and shrimp (41%) in east Florida; snappers (4%) and oysters (46%) in South Carolina; clams (188%) in Georgia; and black sea bass (2%), flounders (12%), and tunas (60%) in North Carolina.

Prices

Between 1997 and 2006, ex-vessel prices for high-valued species such as clams (\$6.95 average annual price) and oysters (\$4.06 average annual price) declined 29% for clams but increased 25% for oysters. Adjusting for inflation, the price of clams and oysters decreased 40% and increased 6%, respectively. Ex-vessel values for groupers (\$2.49 average annual price) and tunas (\$1.79 average annual price) increased 35% and 61%, respectively. Shrimp prices experienced the largest price decline, decreasing 34% (44% in real terms).

Conchs landed in Georgia had the largest annual increase in price of any species or group in the region: \$1.22 per pound compared to \$0.63 per pound, a 94% increase in price between 1997 and 2006.

With the exception of clams, blue crab, and shrimp, 2006 ex-vessel prices for key species or groups was higher relative to its average price over the time period. Flounders in 2006 were \$2.12 per pound compared to an average of \$1.76 per pound, a 21% increase in price. Groupers in 2006 were \$2.96 per pound compared to an average of \$2.49 per pound, a 19% increase in price.

Recreational Fishing

The South Atlantic region had 6 million recreational anglers in 2006 who took a total of 24 million fishing trips. Anglers spent \$1.3 billion on recreational fishing trips and \$9.2 billion on durable fishing related equipment. Economic impacts related to recreational fishing were highest in eastern Florida. Fishing related expenditures in eastern Florida contributed \$6.4 billion in total sales to the regional economy, added 55,643 jobs, and generated \$3.3 billion in value added impacts.

South Atlantic Summary

Key South Atlantic Recreational Fishing Species

The South Atlantic's recreationally important species are: black sea bass, bluefish, dolphinfish, king mackerel, red drum, sharks, sheepshead, Spanish mackerel, spot/Atlantic croaker, and spotted seatrout.

Participation Rates

Each year, coastal county residents and out-of-state anglers have accounted for an average of 92% of the total number of anglers during the 1997-2006 period. Coastal county residents averaged 43% and out-of-state anglers averaged 49%.

Participation for both angler groups stayed relatively stable during the time period. There was a slight decrease from 1997 to 1999 (from 3.6 million to 3.1 million for both groups), followed by an upward trend from 2000 to 2006 (from 4.5 million to 5.6 million).

Recreational Fishing Facts

Participation

- The total number of anglers between 1997 and 2006 increased **55%**. Participation increased for all angler groups: coastal county residents (58%), non-coastal county residents (66%), and out-of-state residents (50%).
- **Eastern Florida** had the greatest number of anglers in 2006 (**2.6 million**), while **Georgia** had the fewest number of anglers (**219,000**).

Recreational trips

- In 2006, the number of fishing trips taken from shore comprised **53% of total fishing trips** taken in the region. This was followed by trips taken from a private/rental boat (45%) and party/charter boat (2%).
- South Carolina anglers took 2.7 million trips in 2006, a **66% increase** from the 1.6 million trips taken in 1997. This increase was the largest in the region for this time period.
- In eastern Florida, **13 million fishing trips** were taken in 2006: 6.5 million by private/rental boat, 6.4 million from shore, and 173,000 by party/charter boat.

Catch data for key species

- In 2006, catch (harvest and release) of Atlantic croaker and spot was higher than any other key species or groups in this region: **12.8 million fish**.
- Catch of sharks increased **266%** from 1997 to 2006, the largest increase in catch of any key species or groups.

Recreational Fishing Trips

In 2006, 23.8 million fishing trips were taken in the South Atlantic region. In 2006, 53% of total fishing trips were

taken from shore, 45% were taken from a private/rental boat, and 2% were taken from a party/charter boat. On average, 19.7 million fishing trips were taken annually from 1997-2006.

Over the time period, the total number of trips taken in the South Atlantic region remained fairly steady. There was a 27% decline in trips between 1997 and 1999, (from 18.3 million to 14.4 million) and then a 40% increase in 2000 (20.1 million). Between 2002 and 2006, the number of trips increased from 17.8 million to 23.8 million.

The number of private/rental boat trips and shore trip increased from 1997-2006. However, the number of party/charter trips declined over the time period from a high of 929,000 in 1997 to 412,000 in 2003 (a 56% decline). In 2005, the number rose to 601,000 and then fell again in 2006 to 552,000.

Expenditures and Economic Impacts

Residents in the South Atlantic region spent \$563 million on all trip related expenses in 2006. Private boat trip expenditures were \$296 million, shore trip expenditures were \$228 million, and for-hire trip expenditures were \$39 million. Non-residents spent \$760 million on fishing trips in the region and of this total, \$556 million was spent on shore trips. Expenditures on durable equipment was highest for boat expenses at \$4.5 billion, with vehicle expenses following at \$2.5 billion.

In eastern Florida, recreational angling contributed most to the region with \$6.4 billion in total sales impacts, 56,000 jobs created, and \$3.3 billion in value-added impacts generated. Economic impacts from recreational angling in North Carolina followed with \$2.5 billion dollars in sales impacts, 24,000 jobs created, and \$1.2 billion in value-added impacts. Economic impacts in South Carolina (\$534 million in sales) and Georgia (\$192 million in sales) followed.

Recreational Harvest and Release

The combined catch of spot and Atlantic croaker was the largest catch of any key recreational species or species groups in 2006. Approximately 5.5 million fish were harvested and 7.3 million fish were released. Spotted seatrout was also caught in large numbers with over 6.6 million fish caught in 2006. Of the key species/groups, king mackerel had the lowest catch numbers with 707,000 fish harvested and released.

In 2006, the top three species caught in eastern Florida, were: spotted seatrout (3.2 million), gray snapper (2 million), and kingfish (1.8 million). In North Carolina, anglers harvested and released 8.6 million Atlantic croaker/spot, 3 million bluefish, and 1.4 million black sea

bass. In South Carolina, Atlantic croaker/spot (3.3 million), Southern kingfish (2.5 million), and black sea bass (1.1 million) were the most caught species. Georgia anglers caught more spotted seatrout (1.3 million), Southern kingfish (1.1 million), and Atlantic croaker (351,000) than any other key species or groups.

Marine Coastal Economy

Of the four states in the South Atlantic region, Florida contributes more to the national economy in terms of gross domestic product by state and in terms of establishments and employee numbers. Florida's annual payroll and employee compensation was also highest in the region. For all categories, Florida was followed by Georgia, North Carolina, and South Carolina. In 2005, gross domestic product by state ranged from \$666.6 billion (Florida; 5.39% of the national total) to \$140.1 billion (South Carolina; 1.13% of the national total).

The Commercial Fishing Location Quotient decreased from 2001 to 2005 for all states except for Georgia. Despite this drop, Florida had the highest Commercial Fishing Location Quotient at 1.01 in 2006. South Carolina, Georgia, and North Carolina followed. Florida was the only state in this region with a measure slightly higher than the national baseline of 1.0.

Seafood Sales and Processing

In 2005, there were 502 non-employer firms in the seafood retail industry, up slightly from 1998 (493 firms). In contrast, employer establishments in this industry increased 31% from 1998 to 2005, with all states showing double-digit gains. In 2005, the annual payroll (\$29 million) and number of employees (1,700) of these establishments represented, respectively, a 76% and 41% increase over 1998 levels.

With the exception of North Carolina, all South Atlantic states experienced an increase in the number of non-employer seafood product preparation and packaging firms from 1998 to 2005. Most of these gains were due to increases in Florida, which added 116 firms to this industry, a 183% increase. Overall, receipts were up 80% (60% in real terms). In contrast, the number of non-employer establishments engaged in this industry declined 41%. Annual payroll fell to \$88 million in 2005, a 6% decrease from 1998 levels, and the number of employees fell 33% to 2,800 employees.

In 2005, there were 386 employer establishments engaged in seafood wholesale activities in the South Atlantic region, a decrease of 26% from 1998. The majority of these establishments are in Florida (258 or roughly two-thirds of the region's total). There was considerable variability in the composition of this industry across states. For

example, in North Carolina there were 77 establishments with 703 employees and an annual payroll of \$18 million. In contrast, Georgia had 29 establishments, with 640 employees and an annual payroll of \$33 million. In 2005, overall, annual payroll in this region and employees working in this industry were \$122 million and 3,400 employees, respectively.

Transport, Support, and Marine Operations

Establishment numbers for industries in this sector were generally available for all states. However, with the exception of Florida, the availability of employee numbers and annual payroll data was limited.

In Florida, there were 1,233 establishments with an annual payroll of \$1.1 billion and 30,000 workers employed in this sector in 2005. This represented an 8% increase in establishments, a 13% increase in employees, and a 45% increase in annual payroll since 1998. Ship and boat building accounted for 25% of the Florida establishments in this sector in 2005 and 43% and 41% of the employees and payroll. Overall, marinas accounted for the largest number of establishments (551) but ship and boat building employed the greatest number of people (12,729) and had the highest payroll (\$454.2 million). Marine cargo handling operations and marina operations ranked second and third in terms of the number of people employed.

Excluding Georgia, for which employment and payroll data was generally not available, ship and boat building represented the largest industry in this sector in the South Atlantic. In 2005, 425 establishments with an annual payroll of \$685 million employed 19,000 workers. Based on available data which in this case includes Georgia, marine cargo handling represented the second largest industry in this sector. In 2005, 110 establishments with an annual payroll of \$351 million employed 11,000 workers.