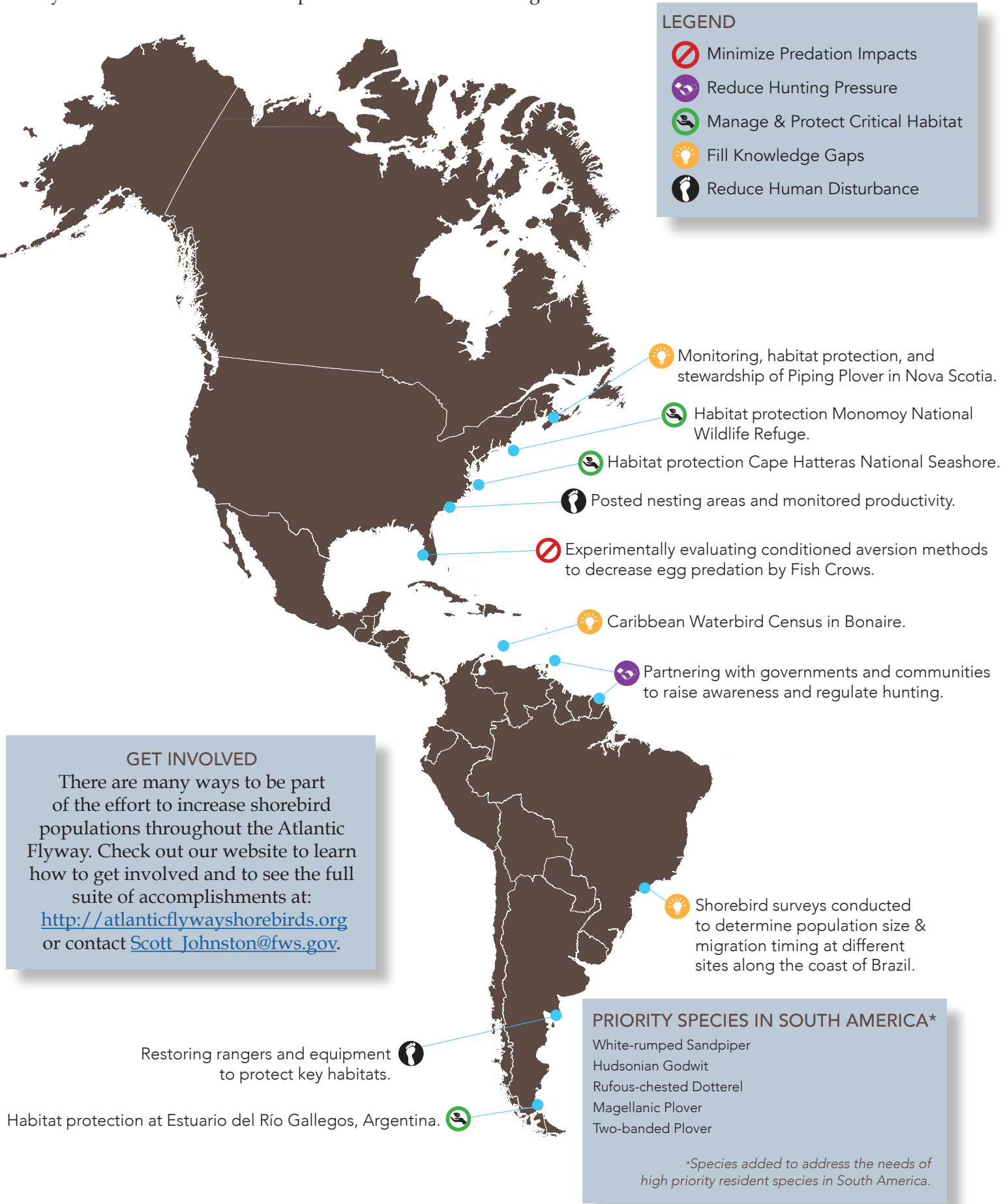


ACCOMPLISHMENTS
Partners throughout the Flyway are addressing threats to shorebirds and working towards meeting the goal of increasing shorebird populations 10% by 2025. Below are some examples of conservation on the ground.



EXECUTIVE SUMMARY

Atlantic Flyway Shorebird Initiative

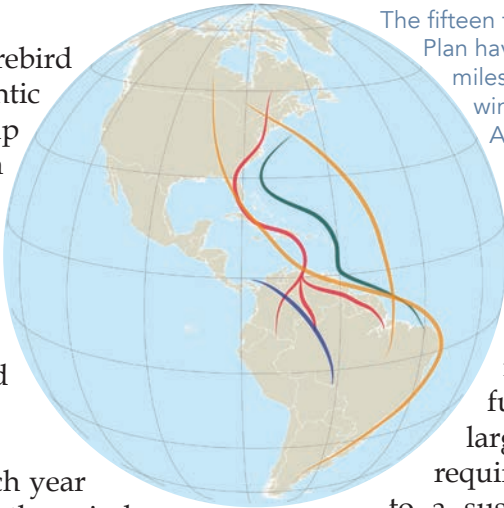
A Business Plan



LIVING ON THE EDGE

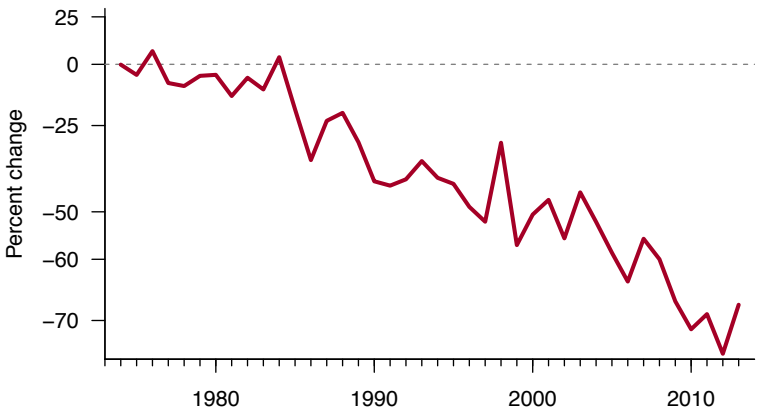
Recognizing the decline of migratory shorebird populations throughout the Atlantic Flyway in the Americas, a partnership of government agencies, conservation organizations, and academics, developed an ambitious business plan to reverse declining population trends and build a foundation to safeguard the phenomenon of migration. Together, the actions outlined should sustain shorebird populations throughout the Flyway.

Shorebirds travel thousands of miles each year between the tundra of the Arctic and the wind-swept beaches of Tierra del Fuego. The majority of boreal-arctic shorebirds breeding in Alaska and Canada (60 of the 75 North American populations) spend their non-breeding period in South American or Caribbean countries. Annual round-trip migration usually requires a sequence of flights between two or more stopover sites that connect breeding and non-breeding habitats.



The fifteen focal species identified in the AFSI Business Plan have wide ranging migration routes; at 10,000 miles, the Red Knot breeds in the Arctic and winters in Tierra del Fuego at the tip of South America.

Protecting all stopover links along the migratory pathway is a critical component of shorebird conservation. The degradation of just one site can have a profound and catastrophic impact on a species. Implementing full annual cycle conservation across large geographic and cultural landscapes requires long- term vision and commitment to a sustained effort over many years. The flyway approach described herein provides a road map for a coordinated effort involving multiple organizations working together across political boundaries to effectively conserve Atlantic Flyway shorebirds.



These data come from the International Shorebird Survey, the Atlantic Canada Shorebird Survey and the Ontario Shorebird Survey and fall in to the category of "monitoring indices of population status". Courtesy of Environment and Climate Change Canada / Government of Canada

FOCAL SPECIES

American Golden Plover

American Oystercatcher

Greater Yellowlegs

Lesser Yellowlegs

Marbled Godwit

Piping Plover

Purple Sandpiper

Red-necked Phalarope

Red Knot

Ruddy Turnstone

Sanderling

Semipalmated Sandpiper

Snowy Plover

Whimbrel

Wilson's Plover

Piping Plover chick. Jim Fenton

MAJOR THREATS

Overall, shorebirds face numerous threats across multiple geographies and political landscapes during their annual cycle. To slow or reverse shorebird population declines, four primary anthropogenic threats have been identified as key mortality sources for Atlantic Flyway shorebirds:

- *habitat loss and change;* Including:
 - residential and commercial development;
 - coastal engineering;
 - incompatible management; and
 - invasive plants and invertebrates.

- *human disturbance;*
 - *hunting;* and
 - *predation.*
- An assessment of the overall threat ratings throughout the flyway highlights *habitat loss and change as the primary stressor* on shorebird Focal Species along the Atlantic Flyway.

IMPLEMENTATION

To implement the business plan the most serious human-induced threats affecting shorebird species and their habitats along the Atlantic Flyway are addresses with five key strategies:

1. manage and protect critical habitat;
2. minimize predation impacts;
3. reduce human disturbance;
4. reduce hunting pressure; and
5. fill knowledge gaps.

Each strategy has associated actions and objectives. The implementation of these strategies will lead to a *10 to 15 percent increase in shorebird Focal Species population levels.*

FUNDING NEEDS

The business plan is built on an assumption that adequate funds can be raised over a 10-year period and effectively invested in activities to achieve our goal. To do this, the AFSI partnership will need to raise an estimated \$90 million.

The successful implementation of the business plan will require a collaborative effort to secure funding from Federal and state governments; multilateral and bilateral agencies; foundations; and individuals.

BUDGET	
Period - 10 years	USD
1a. Manage and protect critical habitat Commercial and residential development	21,410,000
1b. Manage and protect critical habitat Incompatible coastal engineering	4,700,000
1c. Manage and protect critical habitat Incompatible natural resource management	8,060,000
1d. Manage and protect critical habitat Invasive species management	3,320,000
2. Minimize predation impacts	10,940,000
3. Reduce human disturbance	30,565,00
4. Reduce hunting pressure	3,450,000
5. Fill knowledge gaps	7,935,000
TOTAL	90,380,000

Over the duration of the business plan, the bulk of resources required to achieve a 10 to 15 percent increase in shorebird Focal Species will be invested to: (1) manage and protect critical habitat; (2) reduce human disturbance; (3) minimize predation; and (4) reduce hunting pressure. Combined, these three strategies represent more than 65 percent of the total budget. In the short-term, resources will be required to fill in critical information gaps needed to inform investments in each of these three major threat-reduction strategies (e.g., assess the status of priority shorebird sites, estimate population trends, determine reproductive success of beach nesting species).

“Like the resources it seeks to protect, wildlife conservation must be dynamic, changing as conditions change, seeking always to become more effective.”
Rachel Carson