

## Osprey Beach Trail (1<sup>st</sup> page Introduction)

Walking Time: One hour-round-trip.

Welcome to Osprey Beach Trail in Bear Cut Preserve. This trail runs parallel to the beach and offers wildlife viewing as well as a look at many of our plant species, both rare and common. We suggest you bring sunscreen, a hat and a cold drink. The companion to this brochure is a plant identification sheet, which provides additional details and pictures of trail plants. Please remember that this is a preserve and collection of plants and animals is not allowed.

1. **Barrier Islands:** Key Biscayne is a sedimentary barrier island that helps protect the mainland Florida from the full force of hurricanes. Weather events, such as sub-tropical depressions, tropical storms, and hurricanes change the shape of barrier islands. Due to their relative isolation, barrier islands often contain uncommon species of plants and animals. Underdeveloped areas of barrier islands like this preserve are rare in densely populated areas such as Miami-Dade County.
2. **Coastal Scrub Zone:** The area you are walking through now is called the scrub zone. This area is a transition area between the dunes and the coastal maritime hammock. Its characteristics are shrubby, low-growing plants like the Saw Palmetto combined with Cabbage Palms (the Florida state tree) and Sea Grape Trees.
3. **Butterflies:** Some species of butterflies are actually drawn to the edge of man-made trails, such as this one. You may spot a migratory Monarch or a Gulf Fritillary with orange on top of their wings and a silver under-side. The Yellow Sulphur Butterflies abound. Butterflies are attracted to the nectar of certain flowers, but during its caterpillar stage, they usually require a different plant species to eat. Some caterpillars are so food specific that they will eat only one species of plant and without it, they cannot survive.
4. **Wildflowers:** Many beautiful wildflower species along this trail provide food and even shelter for a variety of insects. Some of these wildflowers grow on the dunes closer to the beach and help prevent erosion. Plant-animal interactions are fascinating to watch, with wildflowers often attracting insect pollinators through pattern, color, and smell.
5. **Snags:** Many of the dead trees that you see around you were killed by fire and hurricane. They have been left standing to provide a refuge for wildlife ranging from raccoons and reptiles to birds. Look carefully at their branches and cavities to spot any visitors!
6. **Birds:** Barrier islands like Key Biscayne provide an important resting place for migratory birds and a nesting spot for many species. Osprey, Terns, Hawks, Ibis, Woodpeckers, Herons, Kestrels, Egrets, and Kingfishers are just some of the many birds you may see and hear on this trail.
7. **Island History:** Key Biscayne's ancient inhabitants were the Tequesta Indians, who lived on the island's bounty of fish, game, and generally wonderful weather. Early explorers and botanists who wrote about Florida later visited the island. A coconut plantation helped shape the landscape of the island. This land was donated to the county for use as a park by the pioneering Matheson family in 1947.
8. **Native Plants Versus Exotics:** Many of the plants that you see on this trail, including the Strangler Fig Tree directly in front of you, are native to Florida and provide important food and shelter for native animals. In climates like South Florida, where freezes are rare, invading exotic plants are a year-round problem for all natural areas. These exotic plants often "crowd out" native plants upon which native animals rely.

9. **Ocean View:** The ocean flats, off the shore of Key Biscayne, are very special. Many juvenile sea creatures live in the seagrass beds covering the flats. The seagrass beds provide protection and food for these young animals, including Seahorses, Pipefish, Crabs, Sea Squirts, and the endangered Queen Conch.
10. **Hurricanes:** Tropical storms and hurricanes are a major force of change on barrier islands. Hurricanes may change the actual shape of barrier islands by re-sculpting the dunes and the beach. Hurricane Andrew, in 1992, caused much damage to the island, but also had the positive impact of killing many Australian Pine Trees, an invasive exotic species.
11. **Beach Communities:** To your far right, at the edge of the shrub zone, are the dunes. These help to protect the barrier islands from storms. In front of the dunes along the shore, visible only from the beach, is the wrack line, where the high tide deposits seaweed and seagrass along with tiny living organisms onto the beach. To your left is the beginning of the coastal maritime hammock, South Florida's version of a forest. Restoration projects are in progress in all of these communities.
12. **Poisonwood:** Please don't touch this plant! It produces a reaction similar to Poison Ivy. Identifying features of this plant include small dark spots on the leaves, dark blotches on the trunk, and/or dull orange seeds. Although this plant is poisonous to people, some species of bird eat its fruit and act as agents of seed dispersal, such as the endangered White-Crowned Pigeon.
13. **Lightning:** Since Florida is the lightning capitol of the United States, lightning fires are common and a part of the natural ecology of barrier island ecosystems. Accidental fires caused by humans can be detrimental because they burn hotter and longer and may cause long-lasting damage (you can see scorch marks on many Cabbage Palms in the dune area). However, controlled burning, practiced by fire ecologists, can be valuable tool in ecosystem restoration and revitalization.
14. **Rare Plants:** Barrier islands are special geographically isolated places, which often contain rare plants. You may note the threatened native Silver Palm. It was used by early settlers for thatch. Birds enjoy the seeds of this slow-growing palm. The Florida Coontie, a commercially exploited species, is a cycad (ancient order of plants). Also found on this trail and in a few other places in the world are Beach Peanut and Beach Jaquemontia. See the plant identification guide for pictures.
15. **Reptiles:** Many reptiles find the Scrub Zone an attractive place to bask in the sun. You may see the common Green Iguana, an exotic species that breeds in the park. The Five-Lined Skink is a native lizard with a blue tail. The Ameiva, a blue-gray South American lizard is also present. The harmless and speedy Everglades Racer and Yellow Rat Snakes are sometimes sighted sunning themselves along the trail.
16. **The Beach:** You may choose to turn around here and return by the same trail, or take the trail in front of you that leads to the beach. If you walk south (to the right) on the beach itself, you will return to the Nature Center. If you turn left on the beach, you may walk an additional ½ mile to the Fossil Rock Reef, a geologic formation dating back to 64 A.D. Depending on the season, you may see Pelicans, Loggerhead Turtle tracks in the sand, sponges washed up on shore, and Stingrays or Needlefish in the shallow water.