

# **TOWN OF PALM BEACH**

Information for Town Council Meeting on: August 9, 2022

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TO: Mayor and Town Council  
VIA: Kirk W. Blouin, Town Manager  
FROM: H. Paul Brazil, P.E., Director of Public Works  
RE: Mechanical Equipment on the Beach During Sea Turtle Nesting Season  
DATE: July 28, 2022

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## **STAFF RECOMMENDATION**

Town staff recommends Town Council approve the following added protective measures pertaining to mechanical equipment on the beach during sea turtle nesting season:

- Mechanical beach cleaning should occur once a week when conditions are most favorable and not specifically held on the same day each week, if at all possible;
- In accordance with the Florida Department of Environmental Protection (FDEP) Beach Cleaning Permit, a daily marine turtle nest survey, protection and monitoring program must be completed prior to any mechanical beach cleaning. The protection measures include checking for hatchlings on the beach or in the seaweed.
- These protective measures will be included in the upcoming beach cleaning solicitation; and
- The Police Department will continue to only authorize state-permitted and regulated mechanical equipment on the beach during sea turtle nesting season, pursuant to Section 74-195 Town Code of Ordinances.

## **GENERAL INFORMATION**

Mechanical equipment on the beach performs several important functions on the beach year-round. The permitted use of tractors, single rider All-Terrain Vehicles (ATVs), and multiple rider Utility Task Vehicles (UTVs) has been in place for many years. Between March 1 and October 31, there are specific conditions in place that must be adhered to regarding the protection of sea turtles. Current approved uses of mechanical equipment on the beach includes the following:

### **SEA TURTLE NESTING MONITORING**

Town consultant D.B. Ecological, Inc. has been performing daily nesting surveys and periodic lighting surveys for the Town for nearly two decades, resulting in one of the most successful monitoring programs in the state. This effort significantly contributed to the development of the Palm Beach Island Beach Management Agreement (BMA). One of the requirements in the Florida Department of Environmental Protection (FDEP) BMA, signed in 2013, was for the

Town's consultant to increase their monitoring area to include the entire 12.2 miles of Town shoreline as opposed to specific project areas. Monitoring nesting outside of project areas serves as an ecosystem benefit for the Florida Fish and Wildlife Conservation Commission (FWC) to track project influences outside of project areas. Based on a statistically valid sampling plan developed by an FWC scientist, the Town's shoreline is separated into zones where all sea turtle nests are marked in accordance with this plan. Nests in other zones do not require any type of marking in accordance with the FWC plan except as required in areas where DEP has authorized mechanical beach cleaning. This effort, which has been in place since 2014, is performed as a requirement for state-issued perpetual sand placement project permits. This monitoring is not done to support mechanical beach cleaning efforts.

Due to the scale of daily monitoring requirements of the BMA scope, ATVs are utilized where possible. In order to efficiently collect this data, tire tracks from ATVs cross out false crawls and encircle nests, an identified Best Management Practice within the FWC-published Marine Turtle Conservation Handbook. This 170-page document was prepared by FWC to describe interactions or research with marine turtles, their nests, eggs, hatchlings, under the Marine Turtle Protection Act, Florida Statute 379.2431 (1), as granted through a cooperative agreement with the U.S. Fish and Wildlife Service (USFWS) under Section 6 of the U.S. Endangered Species Act. The Handbook has been incorporated by reference in Florida Administrative Code Rule 68E-1. One of the items included in the handbook is the preferred tire pressure of less than 10 pounds per square inch (psi) for vehicles on the beach during nesting season. The ATVs used to support the sea turtle monitoring effort have tire pressures kept between 4 and 6 psi.

Town staff and the regulatory agencies have received a large amount of email correspondence from residents regarding the use of ATVs on the beach during sea turtle nesting season and the marking protocol. Attached are a few email replies from staff, the Town's sea turtle nesting monitor, and FWC in response to some of these emails received in May 2022.

## POLICE DEPARTMENT BEACH PATROL

The Town's Police Department has UTVs that patrol the beaches on a regular basis. The Police Department is aware of the sensitivities on the beach during sea turtle and shorebird nesting seasons and of the tire pressure guidelines. Although the environment is taken into consideration while operating on the beach, the safety of residents and the general public is the first and foremost concern and the beach patrol is to take any means necessary to ensure this paramount responsibility. No concerns have been raised by monitors regarding beach patrol activities. The UTV used to perform beach patrolling has tire pressures below 10 psi.

## BEACH CLEANING

### Tractors within Public Beaches

Raking activities with the use of tractors is strictly regulated by FDEP with specific field permit conditions to prevent any adverse impacts to the beach and dune system, including marine turtles and their nests and habitats. To assist with this work, the Town's sea turtle nesting monitor stakes out nests that are within the corridor for tractors getting on and off the beach, within close proximity of the high tide line, and any other location that could be at-risk as determined by the monitor. This activity, which covers a total of 1.05 miles within Phipps Ocean Park and Mid-Town Municipal Beach, represents 8.6% of the Town's total shoreline. The public beaches are

cleaned either once a week or twice a week depending on the volume of seaweed present. This activity has been requested by the residents and approved by Town Council. The tractor used to perform beach cleaning activities has tire pressures below 10 psi.

#### Tractors outside of Public Beaches

Beach cleaning with the use of tractors, contracted by the Citizens' Association of Palm Beach, is performed in Reaches 7 and 8. This area is generally between Sloan's Curve and the south Town limits, but excludes the City of Lake Worth Beach. As an extra measure to avoid impacts to nests, our sea turtle nesting monitor and FWC annually install a "line" of stakes set every few hundred feet to serve as a guide for the private tractor to stay waterward. Should weather cause tides to wash in landward of these stakes, the beach cleaners know to discontinue service until conditions improve. The tractors used to perform beach cleaning activities have tire pressures below 10 psi.

Town staff and the regulatory agencies have also received a large amount of email correspondence from both residents and concerned members of the public regarding the use of tractors on the beach during sea turtle nesting season. Attached is an email chain that includes comments from both the Town's sea turtle nesting monitor and FWC in response to one of these emails received in June 2022.

#### UTVs outside of Public Beaches

The Friends of Palm Beach organization is hired by private properties to perform beach cleaning activities. While the work to pick up trash and debris is done by hand, this organization does use UTVs to traverse the beach. The use of this vehicle on the beach was granted by the Town of Palm Beach, as previously directed by Town Council, and is not regulated by FDEP. There is no oversight of the vehicle's activities or any knowledge that the vehicles are maintained and outfitted with the tire pressure of less than 10 psi and other elements that are identified in either the FWC handbook or FDEP field permits.

Recently tire tracks have been reported on the upper beach berm. These tracks were in areas with unmarked sea turtle nests. Vehicle traffic in such locations can impact these nests. It is indeterminate if these tracks are related to the beach cleanup activity or with other privately used vehicles. Discontinuing the use of unregulated vehicles on the beach may help reduce unintended impacts to sea turtles and shorebirds.

#### **BEACH CLEANING HISTORY IN TOWN**

The Town's beach cleaning activities, as directed by Town Council, have been adjusted over the years. There was a time when Town staff mechanically cleaned and hand-picked trash and debris along the entire Town shoreline. The Public Works Department historically has provided staff to maintain a safe and appealing environment at the Town's public beaches for the residents and other beach goers. At one time, the Town had two full time employees dedicated to this effort. As recent as 2018, this was accomplished by a single full-time employee operating a tractor driven rake, grooming the sand and followed by hand removing litter and unwanted debris. Fifteen (15) public beach access points were also monitored one day a week, and any litter or debris was removed. The approved FY18 operating budget for this program was \$114,834.

In preparation of cost saving measures included in the 2018 Comprehensive Review of Town Operations (CRTO), and the planned retirement of the operator performing this duty, this provided an opportunity to evaluate the program. Multiple options were identified and included in the CRTO for consideration. At the March 2018 Town Council Meeting, as part of the presentation of the Executive Summary, the option selected was to outsource the beach cleaning task. Staff prepared a scope of work to outline the level of service the in-house program provided, as well as other service level options, for consideration. A bid was received on April 18, 2018. During budget review meetings that followed, staff was given direction to begin the contract award process for the option of Monday and Friday service to the public beaches and litter removal from the public accesses.

The Town no longer has staffing capabilities to pick-up large debris from the public beaches. The beach cleaner's contract includes specific service events to address these matters when they occur.

## BEACH CLEANING OUTSIDE OF THE TOWN

How the beaches are maintained is determined by local preferences. Palm Beach County does not have a regulation banning the use of mechanical equipment to clean beaches. It is recognized that cleaning by hand along large stretches of beach is both labor intensive and cost prohibitive.

### Palm Beach County

The seaweed left on the beach during high tide is referred to by FWC as the "wrack" line. While raking seaweed is preferred by the majority of residents, FWC would prefer that the "wrack" stay in place as it provides benefits to shorebirds and other protected species. For this reason several years ago, Palm Beach County changed from a proactive or routine beach cleaning program to only "as necessary" for human health or safety within their maintained public beaches and parks.

### Other Municipalities

Delray Beach and Boca Raton perform beach cleaning activities with the use of mechanical equipment on their beaches.

## EXCESSIVE SEAWEED

Excessive seaweed has been a more frequent issue over the past several years. The recent frequency of excessive seaweed has occurred every few months rather than every few years. While, the least disruptive process would be for beach raking to be eliminated, FWC recognizes that the presence of excessive seaweed in some cases can impede hatchlings getting to the water. Note that although tracking is not performed, there have been no known impacts to nests/hatchlings as a result of beach cleaning efforts in the Town.

## PUBLIC INTERACTION WITH TOWN CONSULTANTS AND CONTRACTORS

Over the past few months, members of the public have approached consultants and contractors on ATVs and tractors performing both monitoring and cleaning services for the Town. Consultants and contractors treat residents and members of the public with the utmost respect, reports have indicated this treatment has recently not been reciprocated. Sea turtle monitoring includes tough tasks of working in extreme weather conditions and covering a lot of ground each

day in a short period of time. Many of these monitors are young people that have been subjected to harassment. Town staff requests that the public be reminded that these sea turtle monitors work at the direction and under the authority of FWC, are trained by FWC to perform these important jobs to meet the Town's regulatory requirements and that they are doing important sea turtle conservation work.

## SUMMARY

The use mechanical beach equipment should be limited to regulated activities, excluding beach patrolling for public safety, between March 1 and October 31. Communication among Town staff, the sea turtle nesting monitor, equipment operators, and regulatory staff is essential. While environmentally protective measures have been put in place by the state for permitted use of mechanical equipment, there are actions that the Town can take to be more protective. First, the sea turtle nesting monitor should be given time in the morning to not only survey the beaches to identify nests, but to also survey the seaweed for hatchlings before allowing mechanical beach cleaning to take place. Also, the Town should not limit their beach cleaner to a specific day of the week for once-a-week cleaning. The beach cleaner should use the forecast and the tide charts to identify which day during a particular week that tides are lowest and that the sea conditions can best allow beach cleaning to take place without tractors traveling higher on the nesting beach, if possible. Town staff will work with the existing contractor to ensure that best practices are adhered to and will include these added protective measures in an upcoming beach cleaning solicitation.

## **FUNDING/FISCAL IMPACT**

Based on the Town's current contract, the cost to clean the public beaches is approximately \$50,000 annually for twice a week service. When conditions are either too rough for tractors to stay waterward of the nesting beaches or when the volume of seaweed washing in is less, the service is reduced to one day a week. Because Town staff plays an active role in the frequency of the work, the actual cost of this work has been consistently less than budgeted each year since 2018.

## Attachments

cc: Shore Protection Board  
Nick Caristo, Chief of Police  
Will Rothrock, Police Captain  
Patricia Strayer, P.E, Town Engineer  
Robert Weber, Coastal Program Manager  
Lainie Edwards, FDEP  
Robbin Trindell, FWC