Mr. Hadeed,

The purpose of this email is to address various questions or concerns recently brought up by members of the public to you directly.

We would like to begin by reiterating that the Supplemental Environmental Assessment (SEA) for the Flagler County Coastal Storm Risk Management (CSRM) Project, including the project's borrow area (Borrow Area 3A), included an in-depth evaluation of potential environmental impacts. The SEA, completed in January 2024 by the U.S. Army Corps of Engineers (USACE), underwent a series of reviews by state and federal environmental agencies including the Florida Department of Environmental Protection (FDEP), Florida Fish and Wildlife Commission, Florida State Historic Preservation Office, National Marine Fisheries Service (NMFS), Bureau of Ocean Energy Management (BOEM), and US Fish and Wildlife Service (USFWS) before the final SEA was completed. The SEA was completed after a period of public review, which provided the public an opportunity to comment on the draft SEA before it was finalized. The public review period for the draft Flagler County CSRM SEA occurred from October 16th, 2023 through November 15th, 2023. Numerous public meetings for the Flagler County CSRM have been held in Flagler Beach, the most recent one having occurred on June 25th, 2024.

The dredging and beach placement for the Flagler County CSRM project is not impacting commercial fishing areas, which can be seen on attached map labeled "FishHavenandBorrowArea3A". The commercial fishing areas recently raised as areas of concern by members of the public are labeled as "Fish Havens" in the attachment. The haven in question, which can be seen in IMG_1564 (attached), is approximately 9.5 nautical miles away from Borrow Area 3A, the borrow area being used for the ongoing nourishment. One reason this borrow area was chosen is because it does not contain any hard bottoms. This is an important characteristic for a borrow area to have so that compatible beach quality material can be used for placement, as required by the Florida "Sand Rule", outlined below. If hard bottoms exist in a project area, buffers are placed around them so the hard bottom area is not impacted and can be avoided by the contractor.

The borrow area being dredged for the ongoing beach placement is approximately 10 nautical miles offshore. The public may notice the dredge vessel appears in a location that is close to the shore during the occasions when the dredge is pumping the sand onto the beach. However, the nearshore is not being dredged during this operation. From an onlooker's perspective looking out at the ocean from the beach, it may appear as though the dredge is located near the shore of the beach, and that dredging is occurring from a nearshore location. That is a misconception. The dredge is only located on the nearshore when it is pumping sand from the borrow area 10 miles offshore onto the beach.

The Final SEA states that hydrographic exam surveys conducted within the Flagler County CSRM project area and Borrow Area 3A confirmed that no true hardbottom and/or reef habitat is present in Borrow Area 3A. Therefore, there are no reef systems present in the borrow area that the contractor is actively dredging for use of the project. Furthermore, per the hydrographic exam surveys, Flagler County Permit Plates, and Sediment Compatibility Analyses conducted in Borrow Area 3A (including samples from Cuts A, B, and C), this sand source was found to contain beach compatible sand according to the Florida "Sand Rule" (F.A.C. 62B-41.007(2)(j)). This rule - F.A.C. 62B-41.007(2)(j)) - states the following:

(j) To protect the environmental functions of Florida's beaches, only beach compatible fill shall be placed on the beach or in any associated dune system. Beach compatible fill is material that maintains the general character and functionality of the material occurring on the beach and in the adjacent dune and coastal system. Where adequate geotechnical data is available to establish the characteristics of native beach sediment at the placement site, fill material shall be similar to the characteristics of native beach sediment. Native beach sediment refers to the

material within the coastal system at the fill placement site prior to the original beach restoration. Such material shall be predominately of carbonate, quartz or similar material with a particle size distribution ranging between 0.062mm (4.0f) and 4.76mm (-2.25f) (classified as sand by either the Unified Soils or the Wentworth classification), shall be similar in color and grain size distribution (sand grain frequency, mean and median grain size and sorting coefficient) to the native beach sediment or to the material in the existing coastal system at the disposal site and shall not contain:

- 1. Greater than 5 percent, by weight, silt, clay or colloids passing the #230 sieve (4.0f),
- 2. Greater than 5 percent, by weight, fine gravel retained on the #4 sieve (-2.25f),
- 3. Coarse gravel, cobbles or material retained on the 3/4 inch sieve in a percentage or size greater than found on the native beach,
- 4. Construction debris, toxic material or other foreign matter; and,
- 5. Not result in cementation of the beach.

Hence, once the material is pumped to the beach, anything that is greater than 3/4 inch is screened out and this material is placed into baskets for removal from the site, while the remaining beach compatible sand is placed back onto the beach placement area, in coordination with FDEP. These baskets contain wood, glass, other debris, shells, etc. The large majority of non-motile shells are empty, broken or unfortunately some organisms contained with them have died due to the effects of the offshore dredging. These are not baskets full of live non-motile invertebrates. Occasionally, a few live organisms contained in the shells might remain in the baskets. This potential impact to non-motile invertebrates was evaluated in the SEA. Motile organisms (such as most fish) typically escape the hopper dredge vacuum system.

We acknowledge that fish and other mobile wildlife may be temporarily displaced to avoid any potential temporary and minimal adverse impacts or disturbances (noise, turbidity, and/or water quality) that may be caused by the hopper dredge while it's in the area. However, these potential adverse impacts will only last as long as the duration of construction activity. Fish and other wildlife species will return once construction has been completed. Due to the fact that fish are mobile species, adverse impacts to the commercial fishing industry are negligible. Other federal agencies, including BOEM, have documented that recolonization of non-motile invertebrates that may be impacted by the dredge occurs in the ocean floor within one to two years. BOEM is the federal agency that permits the dredging of sand offshore in federal waters. BOEM completes their own NEPA document to review all environmental impacts for the offshore dredging operations.

In summary, we understand and appreciate the public's concerns. Our team at USACE spends countless hours designing CSRM projects, coordinating with federal and state environmental agencies, as well as the public. There may be unavoidable impacts to the non-motile invertebrates on the sea floor. Based on the best available science, experts have repeatedly concluded that recolonization of non-motile invertebrates happens relatively quickly in these borrow areas. Although minimal and temporary adverse environmental impacts may occur, as documented in the Flagler County CSRM SEA, CSRM projects protect homes, businesses, critical infrastructure (such as hospitals and police stations), reduce impacts to major hurricane evacuation routes, provide recreational beaches for local residents and tourists, and most importantly, provide nesting habitat for endangered sea turtles and shorebirds that would otherwise have insufficient habitat.

We hope this helps shed light on the situation.

Thanks,

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