

Progress Report for Contract # 026
Saving the Integrity of Keller Bay and Sand Point Peninsula

Year 3, 1st quarter: Oct. 1, 2024

Rusty A. Feagin, Texas A&M Agrilife / Texas A&M University

Project Summary: Our overarching goal is to protect the unique estuarine resources of Keller Bay by stopping the Sand Point Peninsula from breaching. Our strategy is to develop a living shoreline solution that incorporates public and private partners. Specific objectives include to:

- (1) Identify and model the best actions to stop the peninsula from breaching
- (2) Engage a working group, composed of stakeholders and agencies, to help design and identify a preferred action plan
- (3) Produce engineering/design plans and obtain permits for the Sand Engine

Task 1: Identify and model the best actions to stop the peninsula from breaching

Progress this Quarter: We have finished all sub-tasks.

Next Quarter: We expect to finish writing up the field and modeling results for the report. This report text will be used as a support package for the permit submission (see Task 3 below).

Deliverables:

- (1) High resolution topo-bathymetric map of study area – **completed and already submitted.**
- (2) Wave and flow velocity exceedance graphs for living shoreline design criteria – **completed and already submitted.**
- (3) Maps and videos of future morphologic evolution of study area, with and without various living shoreline alternatives, including a single or multiple Sand Engines – **completed and already submitted.**

Task 2: Engage a working group, composed of stakeholders and agencies, to help design and identify a preferred action plan

Progress this Quarter: Our team conducted several online meetings and informal phone calls between our personnel (7/15, 9/3, 9/4, 9/6, 9/10, 9/12, 9/16). During these meetings, we discussed: continued work on engineering and design plans, and the beginning of the USACE permit submission process.

The team continued to work with the Matagorda Bay Foundation (MBF) to see the project move into a future construction phase, beyond the time of MBMT funding. The TAMU portion of the team spoke with MBF several times, and also the beneficial use manager of the US Army Corps of Engineers (USACE). The West portion of the team continued to reach out to agency

stakeholders to win support for the design plans, and additionally held a meeting with landowners. The ASI portion of the team continued working with the Matagorda Bay Foundation to submit a permit under their name for these design plans.

Next Quarter: The team plans to continue working with the Texas General Land Office, USACE, and other federal and state agencies to build support through the permitting process (see below).

Deliverables:

- (4) Working group meeting recordings – **ongoing**
- (5) Report on working group’s regional strategy and funding plans – **ongoing**

Task 3: Produce engineering/design plans and obtain permits for the Sand Engine

Progress this Quarter: The team has finalized the engineering design plans that will be moved to receive the USACE permit, with the Matagorda Bay Foundation as the project sponsor. The team contacted the USACE and have a date set for USACE Joint Evaluation Meeting (JEM) portion of permitting process. The team heard back from the State Historical Commission during the permitting process, and was told that a magnetometer survey will be required to look for any possible archeological or historical antiquities in the area. This survey has begun.

Next Quarter: Expect to finish the magnetometer survey, complete the USACE JEM meeting, and submit the final preauthorization for the permit. We plan to submit a draft version of a research support package for the permit as well.

Deliverables:

- (6) 30% E&D plans and alternatives for Sand Engine on state/federal-owned land – **completed, will be submitted at the end of next quarterly reporting period**
- (7) Coastal Boundary survey – **not started**
- (8) Support package for permitting of Sand Engine – **ongoing**
- (9) Section 404 and other required permits for Sand Engine, 80% E&D – **ongoing**