

St. Augustine, Florida Back Bay Coastal Storm Risk Management (CSRM) Feasibility Study

**USACE PLANNING TEAM PRESENTATION
JANUARY 2024**

**PLEASE MUTE YOUR PHONE AND COMPUTER
TO AVOID BACKGROUND DISRUPTIONS.**

WE WILL START PROMPTLY AT 1:05

Presented by:

Jason Harrah, Senior Project Manager (Jacksonville District, USACE)

Marty Durkin, Planning Technical Lead (Jacksonville District, USACE)

Jessica Beach, Chief Resiliency Officer (City of St. Augustine)





AGENDA



BUILDING STRONG

- Opening Remarks
- Study Overview
- Overall Study Schedule & Budget
- Initial Array of Alternatives Being Considered
- Schedule Updates (90-Day Window)
- Discipline Specific Study Updates
- Upcoming Public Engagements
- Sponsor Remarks
- Agency Questions/Comments
- Public Comments
- Closing Remarks



House Resolution 2646 (June 21, 2000): St. Johns County, Florida

Resolved by the Committee on Transportation and Infrastructure of the United States House of Representatives, That in accordance with Section 110 of the River and Harbor Act of 1962, the Secretary of the Army, acting through the Chief of Engineers, is **requested to survey the shores of St. Johns County, Florida**, with particular reference to the advisability of providing beach erosion control works in the area north of St. Augustine Inlet, the shoreline in the vicinity of Matanzas Inlet, and adjacent shorelines, as may be necessary in the interest of **hurricane protection, storm damage reduction, beach erosion control, and other related purposes**.

Non-Federal Sponsor: City of St. Augustine (COSA)

POC: Jessica Beach, P.E., Chief Resilience Officer, jbeach@citystaug.com

Study Area

- Entire COSA Municipal Boundary
- 17 Distinct Neighborhoods
- 3 Separate Land Masses
- Interconnected Water Bodies

Objectives to be achieved within the City of St. Augustine over a 50-year period of analysis from 2035-2085 are to...

1. Manage risk of coastal flood damages.
2. Manage risk to health and life-safety.
3. Manage risk to cultural and natural resources.
4. Manage flooding impacts to the local economy.



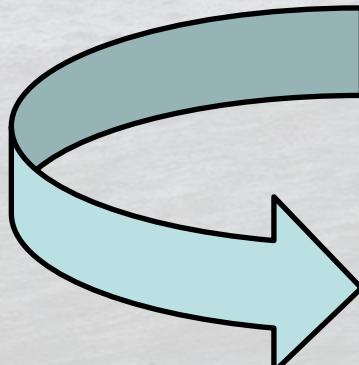
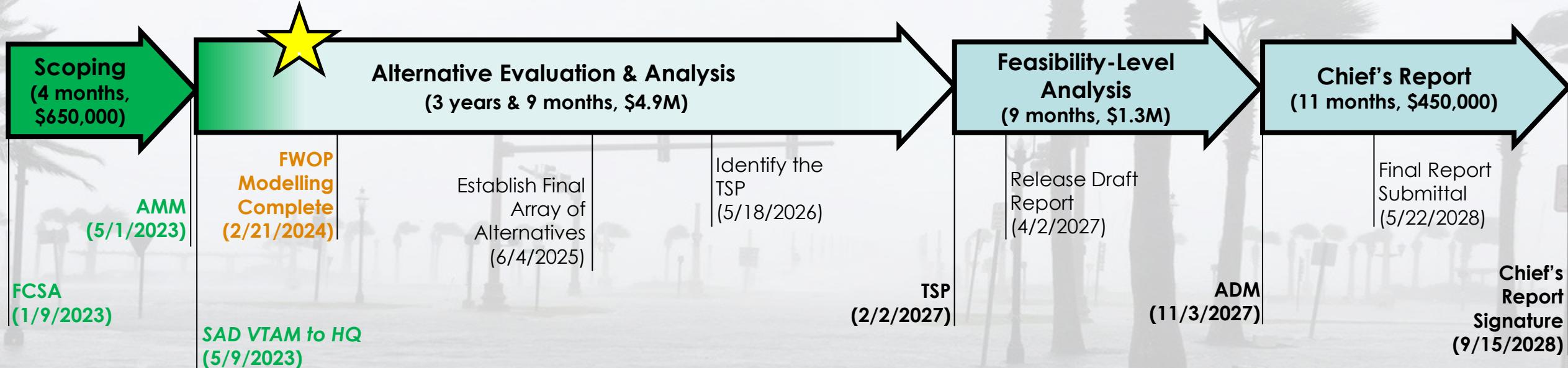
STUDY SCHEDULE & BUDGET

★ We Are Here



BUILDING STRONG

Schedule & Budget Overview: 5 years & 9 months, \$7.3M, Cost Share ~50% Fed, 50% Sponsor



Key Components of the Study Scope:

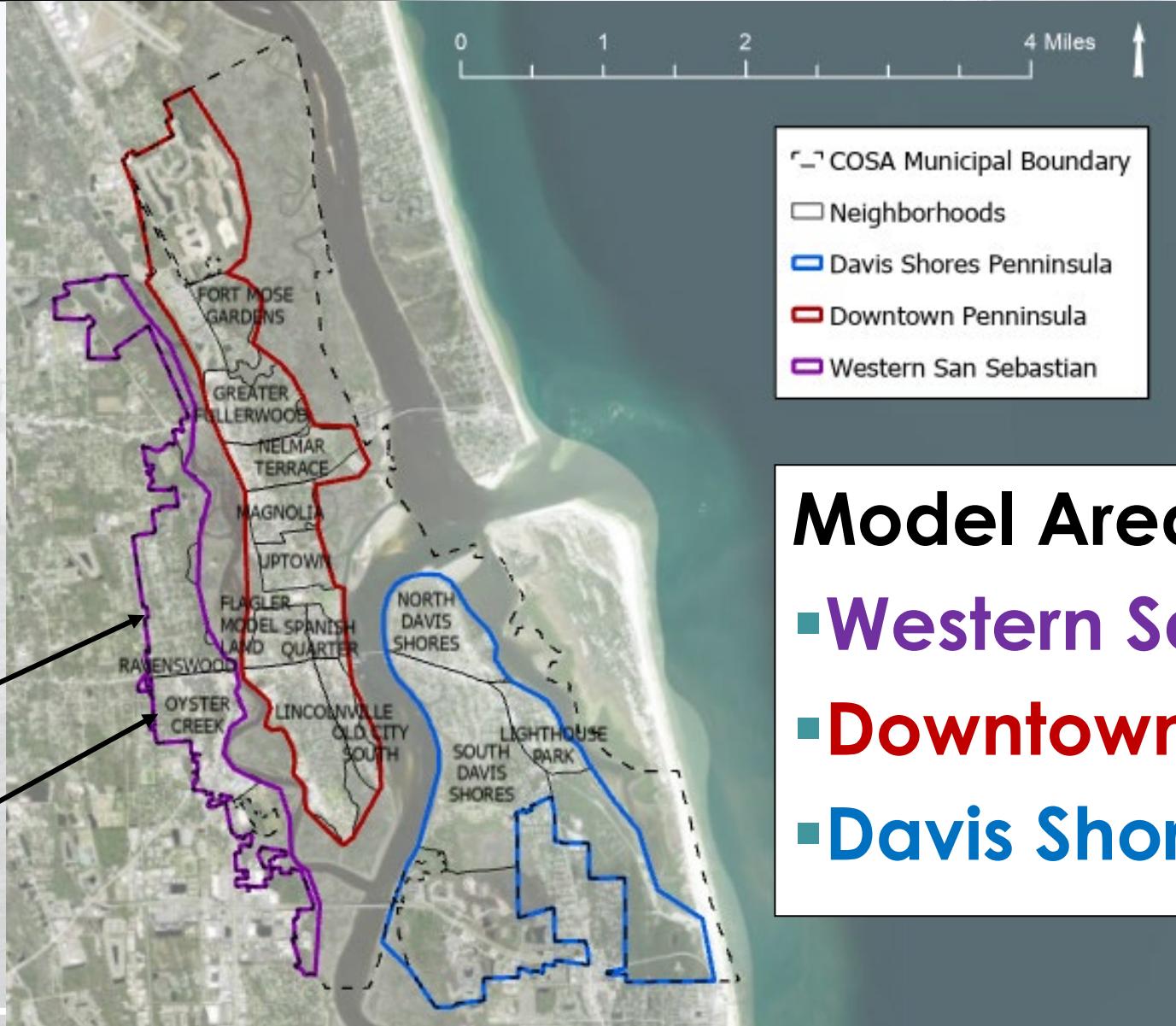
- Entire City of St. Augustine (COSA)
- Compound Flooding
- Full Array of Alternatives & Comprehensive Benefits
- Environmental Impact Statement (EIS) Likely
- Robust Community Outreach



STUDY MODEL REACHES



BUILDING STRONG



Model Areas

- **Western San Sebastian**
- **Downtown Peninsula**
- **Davis Shores Peninsula**



INITIAL ARRAY OF ALTERNATIVES



BUILDING STRONG

Measure Function

Wall/Levee/Dune features stop flooding at the back bay shoreline.

Surge Barrier/Gate features stop flooding before it gets into the back bay waters.

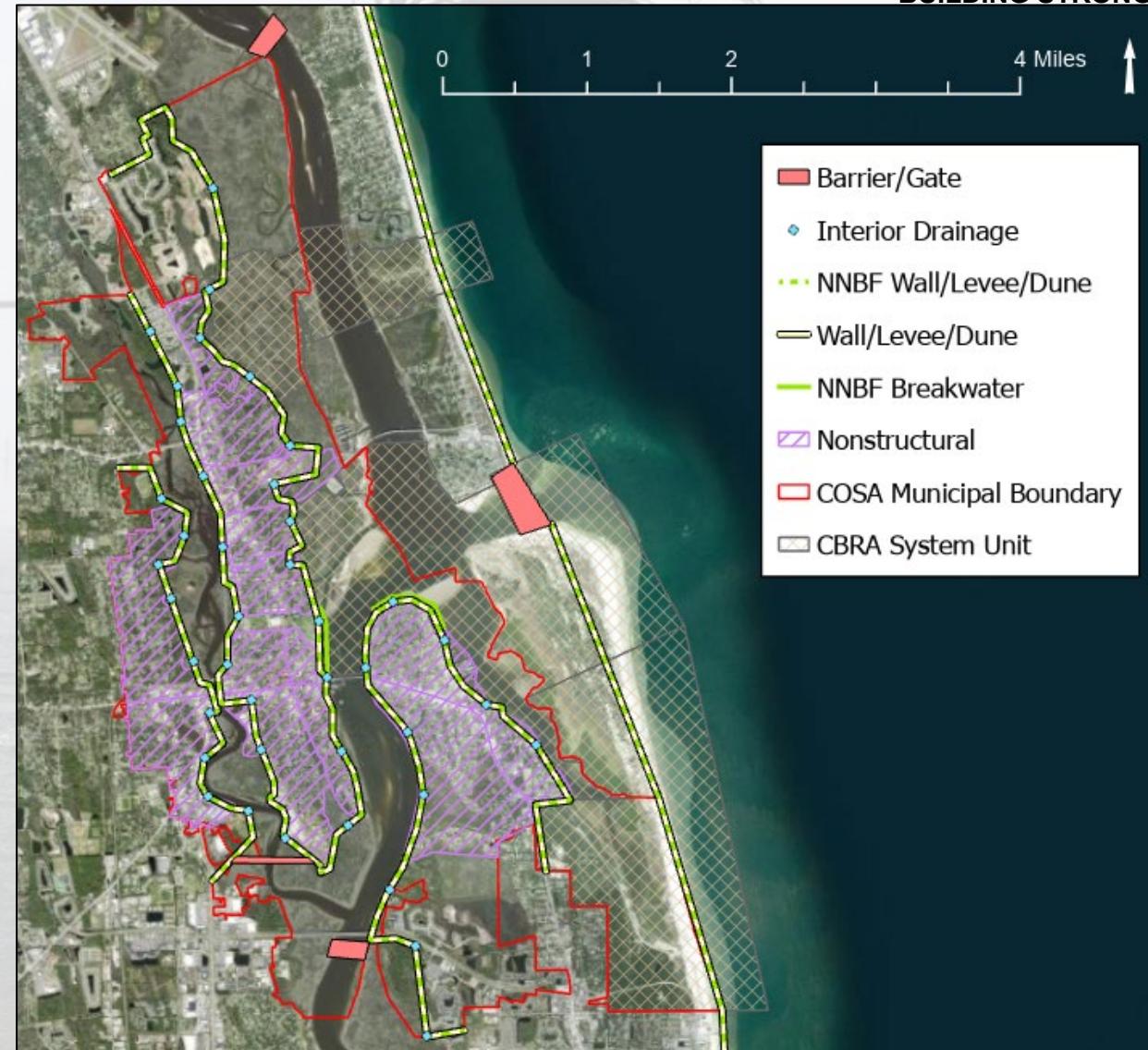
Interior Drainage features get flooding out of upland areas.

Nonstructural features reduce flood risk without directly effecting flooding processes.

Breakwaters/NNBFS can reduce wave energy before it gets to the back bay shoreline.

Initial Array of Alternatives

0. No Action
1. Wall/Levee with Interior Drainage Features & Breakwaters/NNBFS
2. Storm Surge Barrier at Inlet(s)/IWW with Wall/Levee/Dune tiebacks
3. San Sebastian River Flood Gate with Wall/Levee & Interior Drainage Features & Breakwaters/NNBFS
4. All Nonstructural
5. Wall/Levee with Interior Drainage Features & Breakwaters/NNBFS & Nonstructural
6. Storm Surge Barrier at Inlet(s)/IWW with Wall/Levee/Dune tiebacks & Nonstructural



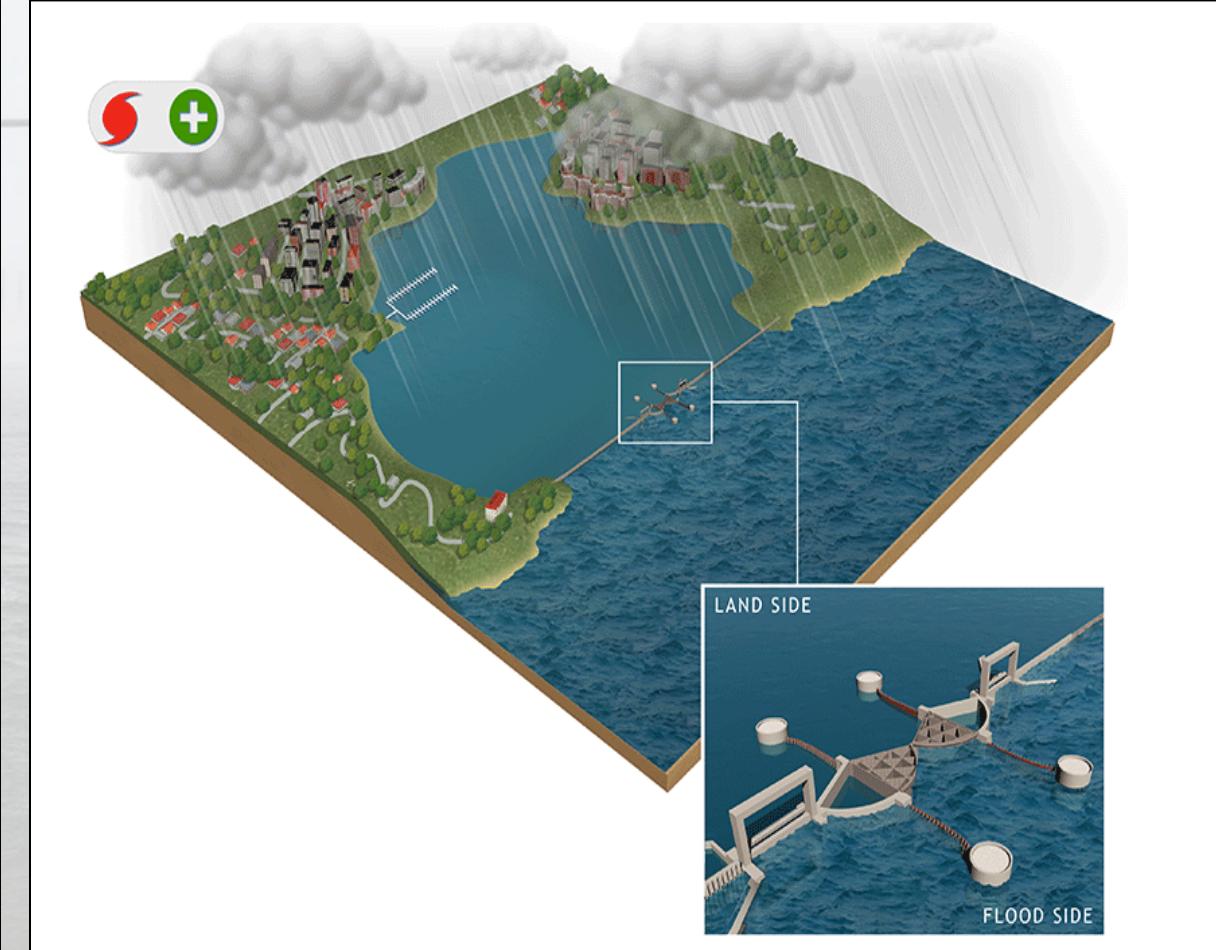
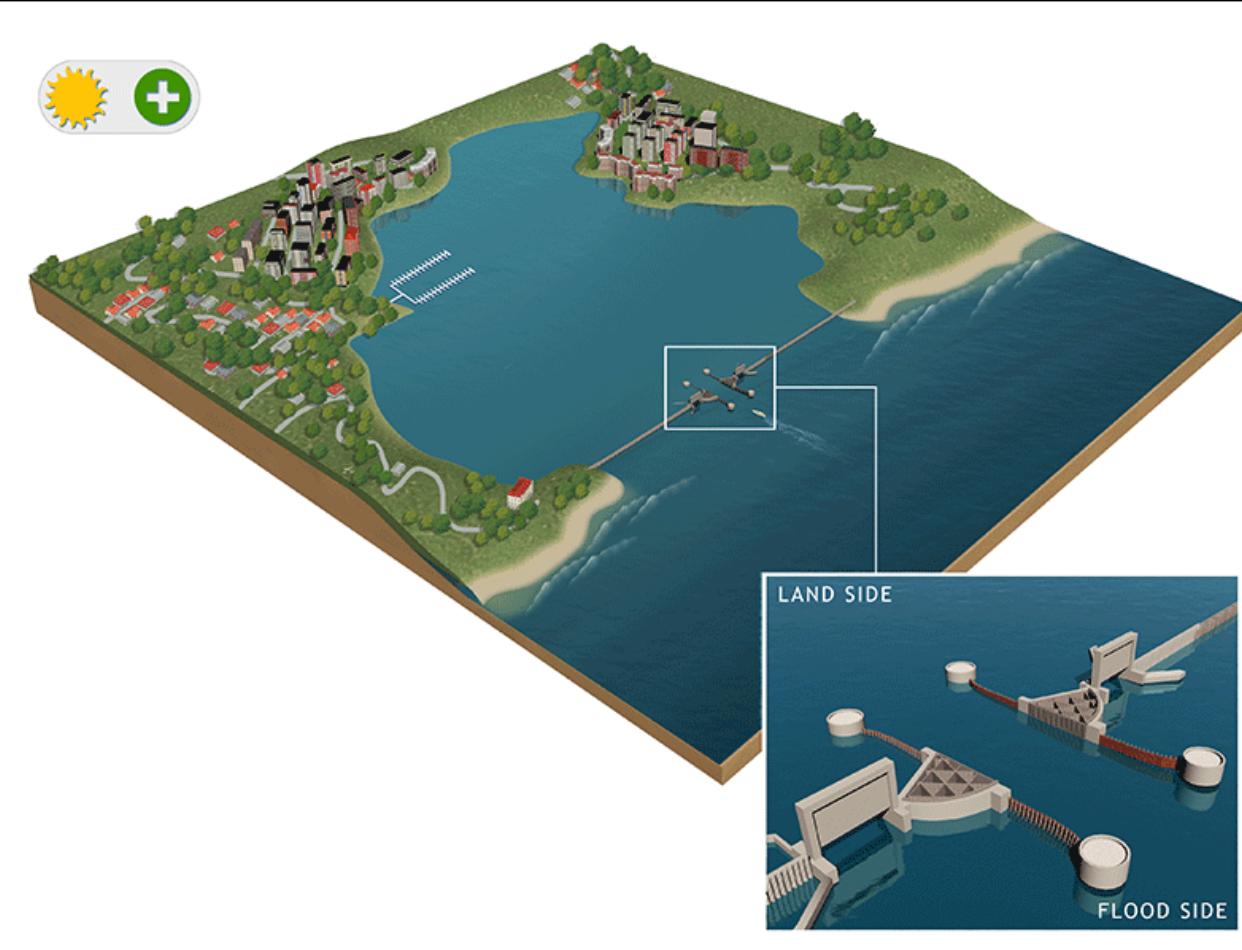


ALTERNATIVES EVALUATION



BUILDING STRONG

Alternative Example: Storm Surge Barriers



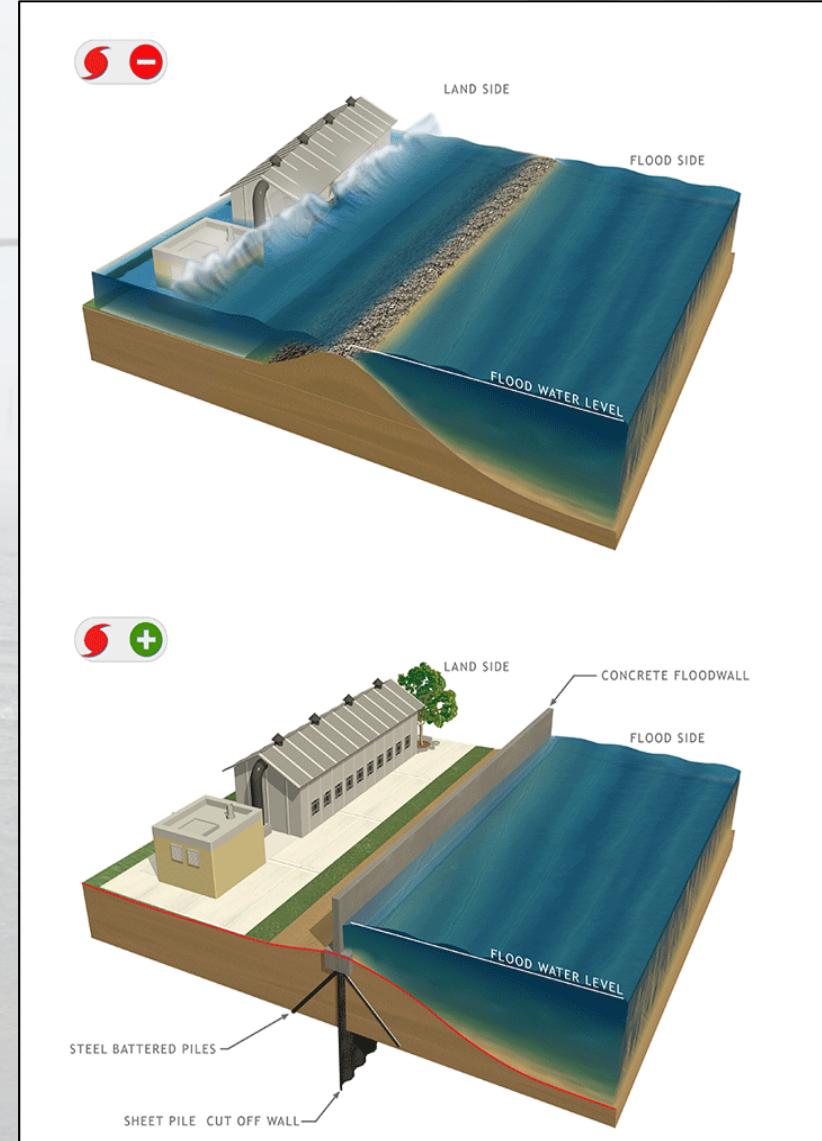
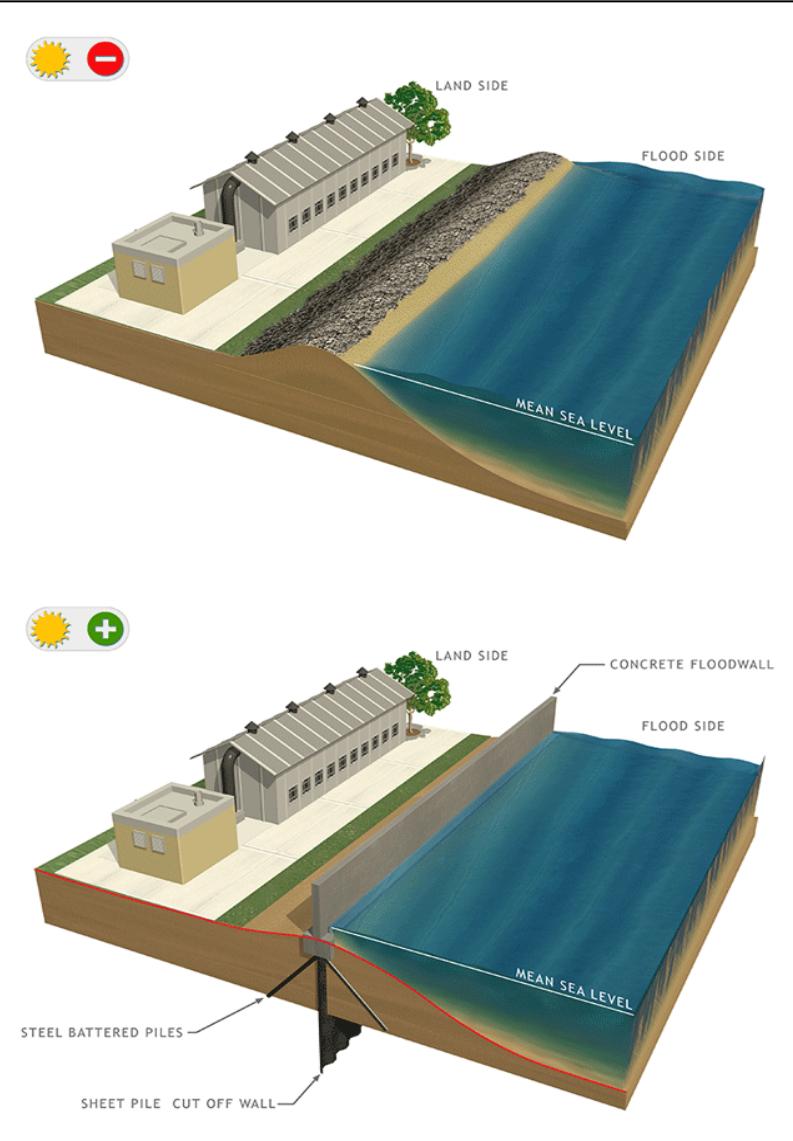


ALTERNATIVES EVALUATION



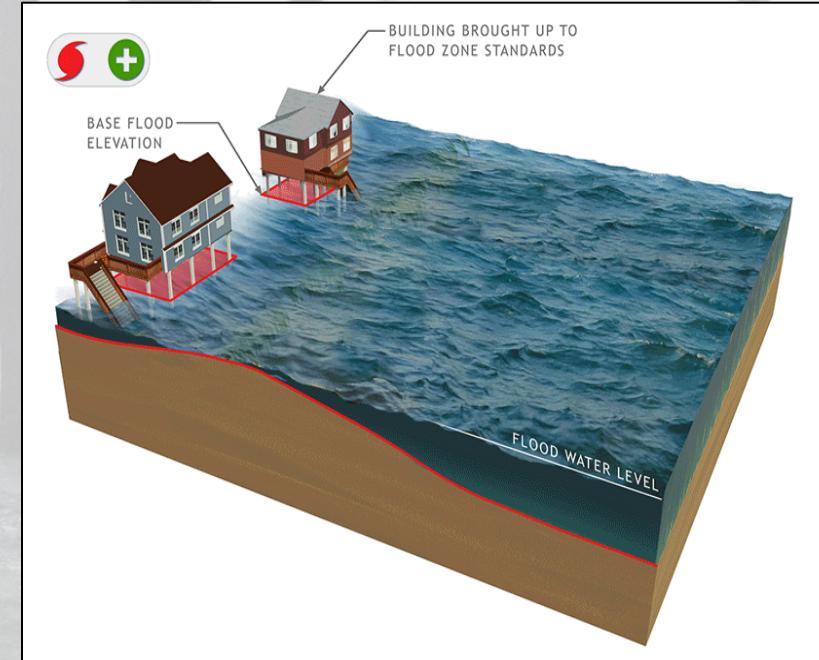
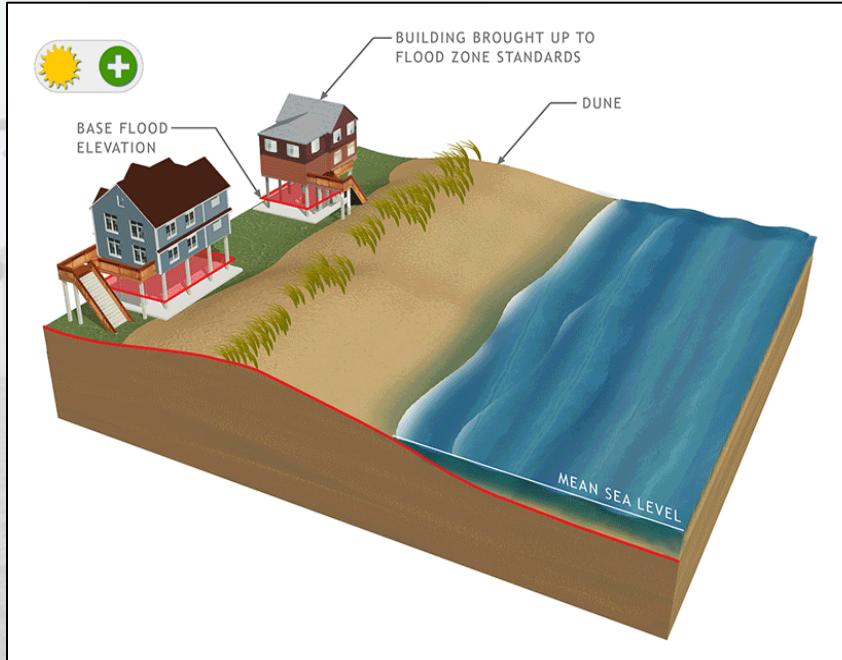
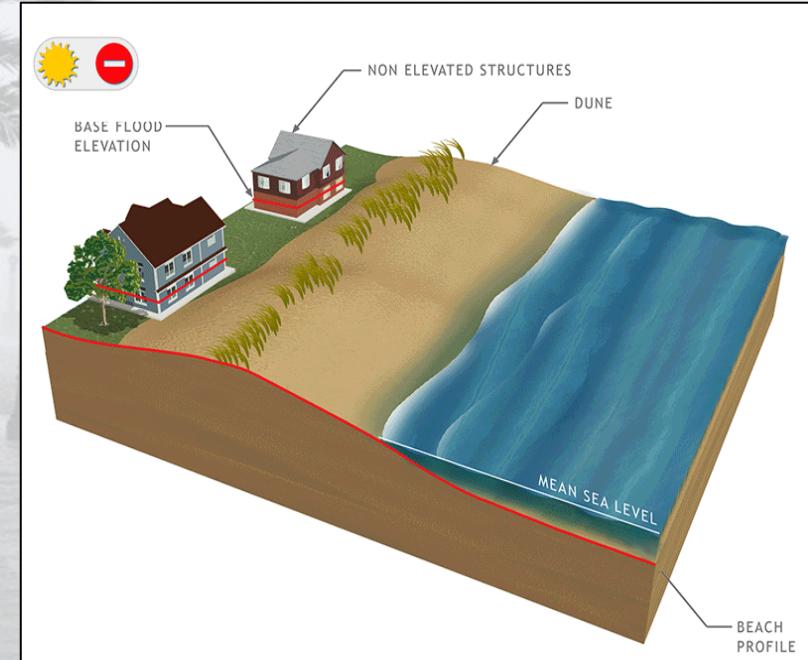
BUILDING STRONG

Alternative Example: Floodwalls



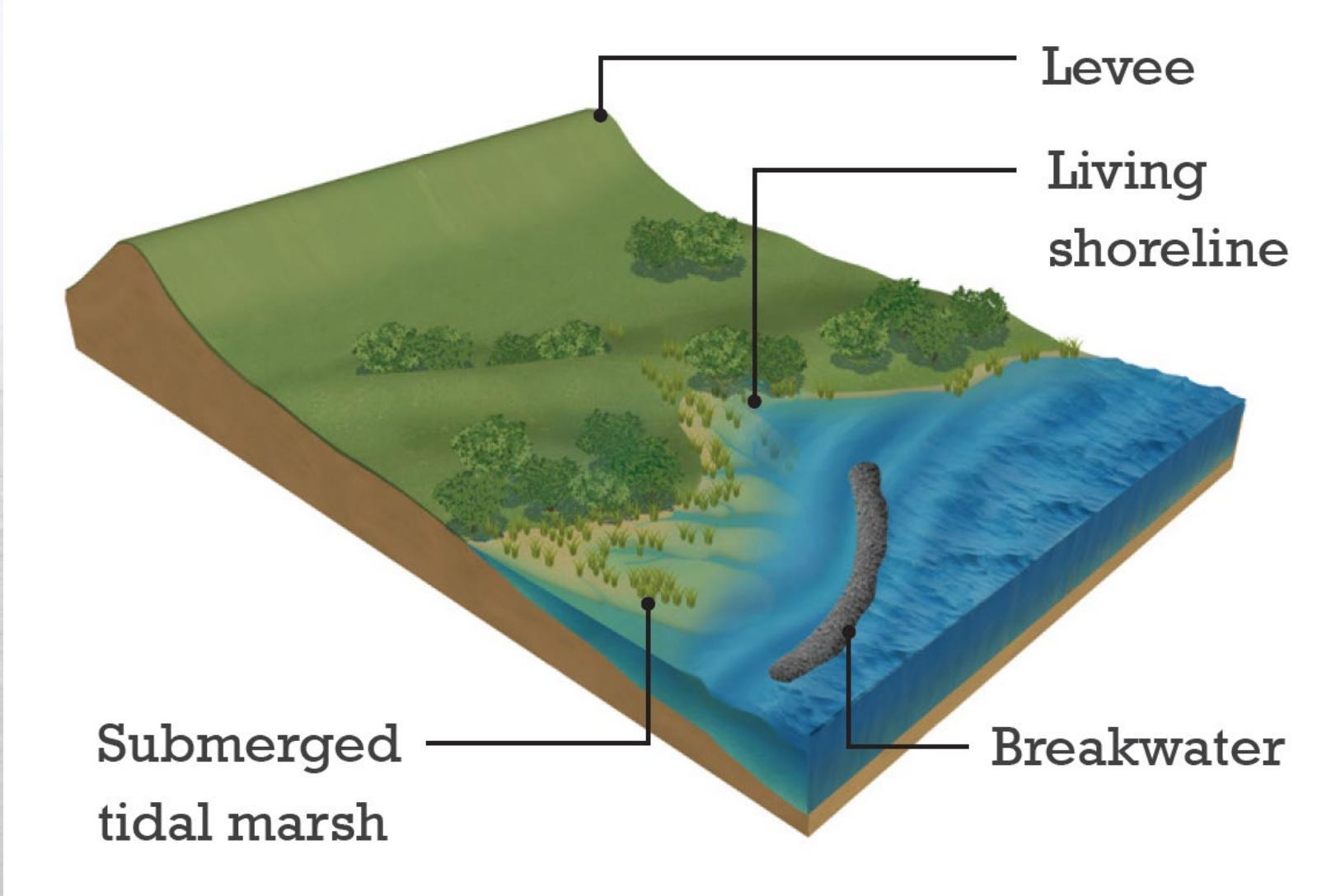
ALTERNATIVES EVALUATION

Alternative Example: Non-Structural (Elevating Structures, Floodproofing, Ring Walls, Acquisition/Relocation)



ALTERNATIVES EVALUATION

Alternative Example: Natural & Nature-Based Features





PATH FORWARD

KEY SCHEDULE ACTIVITIES - LOOK AHEAD



BUILDING STRONG

Key Activities	Finish Date
FCSA Executed	1/9/2023
AMM Milestone Meeting	5/1/2023
Initial Flood Driver Screening (Scope Decision Point)	5/17/2023
End of FY23	9/30/2023
G2CRM FWOP Production Runs	2/21/2024
Establish Initial Array of Alternatives	8/21/2024
End of FY24	9/30/2024
G2CRM FWP Initial Alternatives Production Runs & Post Processing	5/15/2025
Establish Final Array of Alternatives (Scope Decision Point)	6/4/2025
G2CRM FWP Final Alternatives Production Runs & Post Processing	9/22/2025
End of FY25	9/30/2025
Identify National Economic Development (NED) Plan	12/22/2025
Identify Comprehensive Benefits Plan/Locally Preferred Plan (LPP)	3/17/2026
Identify the TSP	5/18/2026
End of FY26	9/30/2026
Exceptions/Waivers Approved by Assistant Secretary to the Army (ASA)	11/20/2026
TSP Milestone Meeting	2/2/2027
Release Draft Report for Concurrent Reviews	4/2/2027
End of FY27	9/30/2027
ADM Meeting	11/3/2027
Final Report Submittal Package to HQ	5/22/2028
Chief's Report Signature	9/15/2028

Complete

Ongoing



DISCIPLINE SPECIFIC UPDATES/ACTIONS



BUILDING STRONG

- **Planning Technical Lead:** Marty Durkin
- **Engineering Technical Lead:** Patrick Snyder
- **Economics Lead:** Vongmony Var
- **Environmental Lead:** Darren Pecora
- **Cultural Resources Lead:** Zuzana Chovanec
- **Real Estate Lead:** Chris Bukolt
- **Office of Counsel:** Katie Gwin



UPCOMING PUBLIC ENGAGEMENT



BUILDING STRONG

Dates	Events
January 18 th , 2024	Monthly Planning Webinar
February 15 th , 2024	Monthly Planning Webinar
March 21 st , 2024	Monthly Planning Webinar
April 24 th , 2024	Public Workshop

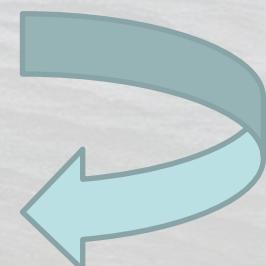


PUBLIC OUTREACH (STUDY WEBSITE)



BUILDING STRONG

<https://experience.arcgis.com/experience/06bb9c98d9184bd9a374a244f6d27474/>





PUBLIC OUTREACH



BUILDING STRONG



U.S. Army Corps of Engineers, Jacksonville District

1 d ·

...

Join USACE Jacksonville and the City of St. Augustine Thursday, Sept. 21, from 1-2:30 p.m. for the monthly St. Augustine Back Bay Study planning meeting. Join online at <https://usace1.webex.com/meet/jason.s.harrah> or dial in at 1-844-800-2712; enter access code 199 927 9909 when prompted. @CityStAug

St. Augustine, Florida, Back Bay CSRM Feasibility Study Monthly Planning Webinar Sept. 21, 2023, 1-2:30 p.m.

Presented by U.S. Army Corps of Engineers
and the City of St. Augustine

[Join online](#)

<https://usace1.webex.com/meet/jason.s.harrah>

[Call in](#)

Dial **1-844-800-2712**

Enter access code **199 927 9909**





PUBLIC OUTREACH (SPONSOR SITES)



BUILDING STRONG

Submit Public Comment

US Army Corps of Engineers Jacksonville District: St. Augustine Florida Back Bay Feasibility Study

Scoping Meeting and Comment Period Notice Letter for USACE St. Augustine Back Bay Coastal Storm Risk Management (CSRM) Feasibility Study (PDF)

The objectives of the study include (1) reduce flooding caused by coastal storms, extreme high tides, and future projected sea level rise in the study area; (2) explore opportunities to increase community resiliency from future coastal storms. Issues that are anticipated include concern for aesthetics, cultural resources, recreation, socioeconomics, environmental justice, wetlands, fish and wildlife resources, threatened and endangered species, and water quality. CSRM measures to be evaluated may include a combination of structural (i.e., tidal gates, seawalls, revetments, levees, drainage improvements, building elevation, etc.), non-structural (i.e., relocation, buyouts, etc.), and natural and nature-based features (i.e., living shorelines, vegetated features, oyster reefs, and maritime forests). Public Comments will be accepted throughout the life of the study.

Back Bay Signing Ceremony January 9th, 2023

[Home](#) > [Government](#) > [Resiliency](#) > [Planning/Studies](#) > Back Bay Feasibility Study with the Army Corps of Engineers

Back Bay Feasibility Study with the Army Corps of Engineers

The objectives of the study include (1) reduce flooding caused by coastal storms, extreme high tides, and future projected sea level rise in the study area; (2) explore opportunities to increase community resiliency from future coastal storms. Issues that are anticipated include concern for aesthetics, cultural resources, recreation, socioeconomics, environmental justice, wetlands, fish and wildlife resources, threatened and endangered species, and water quality. CSRM measures to be evaluated may include a combination of structural (i.e., tidal gates, seawalls, revetments, levees, drainage improvements, building elevation, etc.), non-structural (i.e., relocation, buyouts, etc.), and natural and nature-based features (i.e., living shorelines, vegetated features, oyster reefs, and maritime forests). Public Comments will be accepted throughout the life of the study.

Submit Public Comment

Email: BackBay@citystaug.com

Social Media

<https://www.instagram.com/citystaug/>
<https://www.facebook.com/citystaug>
<https://twitter.com/citystaug>

US Army Corps of Engineers® Jacksonville District

[Jacksonville District Website](#)

Monthly Project Delivery Team (PDT) Meetings



CLOSING REMARKS/QUESTIONS



BUILDING STRONG

- **Sponsor Remarks**
- **Federal Agency Questions/Comments**
- **State Agency Questions/Comments**
- **Local Agency Questions/Comments**
- **Public Comments**