







## District Case Studies – Cultural Resources

Jennifer Marshall

Office of Environmental Management









#### 20TRANSPORTATION 24SYMPOSIUM

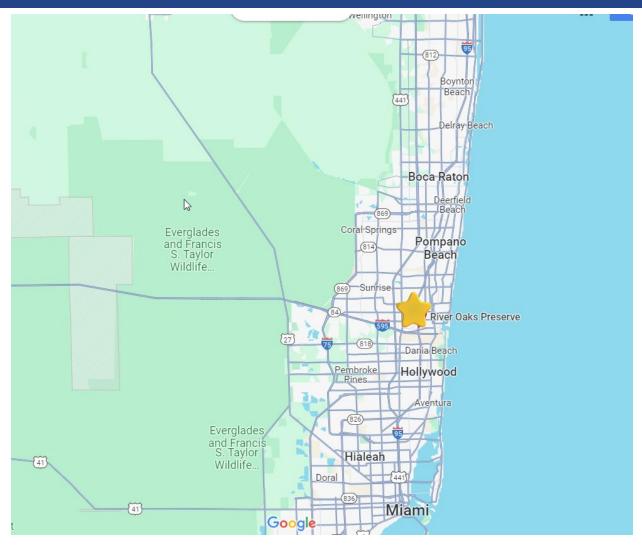
# Innovative Solutions to Historic Preservation: The Relocation of the CSX Rail Bridge in Ft. Lauderdale

Lynn Kelley

**FDOT District 4** 



#### **Project Location**



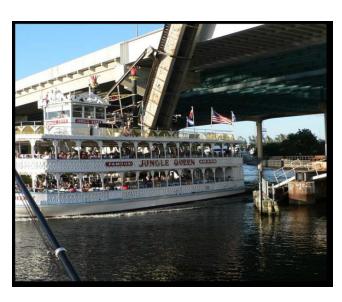


TRANSPORTATION SYMPOSIUM

## Project Objective: Replace Structurally Deficient Rail Bridge

- Bridge did not meet substructure requirements
- Functionally obsolete
  - Did not meet design standards
  - Did not meet train clearance standards
  - > Did not meet the USCG channel width requirement of 70 feet





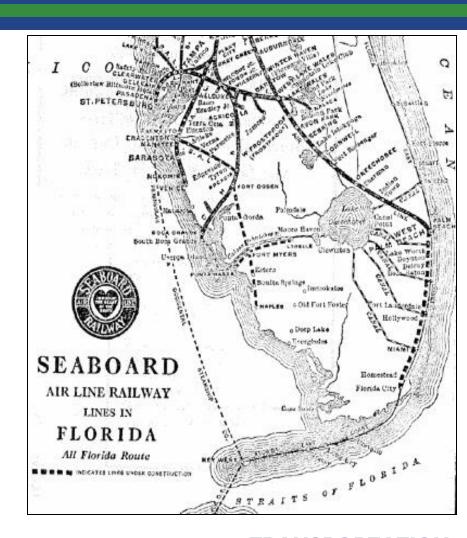
TRANSPORTATION SYMPOSIUM

#### **Project Development & Environment Process**

- The PD&E Process ensures compliance with the National Environmental Policy Act (NEPA).
- Requires an analysis on the project's effects on the natural and social environment.
- NEPA compliance is required to obtain Federal funds or Federal permits.
- Section 106 of the NHPA: will the project have an adverse effect on a historic resource?

#### History of the CSX Rail Bridge

- Constructed for the Miami Extension of the Seaboard Air Line Railway
- Designed by the Scherzer Rolling Lift Bridge Company in Chicago, Illinois
- Original plans prepared in March 1926
- Constructed by the American Bridge Company
- Open to train traffic in 1927
- Approach spans replaced in 1978
- S. Fla Rail Corridor purchased by FDOT in 1988 for Tri-Rail



#### **Project Challenge**

- During the Project Development & Environment (PD&E) Study, SHPO determined that the rail bridge was eligible for listing in the National Register of Historic Places.
- Removing the bridge would be an "adverse effect"
- A commitment to preserve the bridge could mitigate for the adverse effect.

#### A Unique Mitigation Opportunity



- The City of Fort Lauderdale was planning the "River Oaks Preserve"; a passive park which would alleviate flooding by providing stormwater storage.
- The City agreed to incorporate the rail bridge into the park's boardwalk.

#### Moving the Bridge



Contamination remediation & repainting



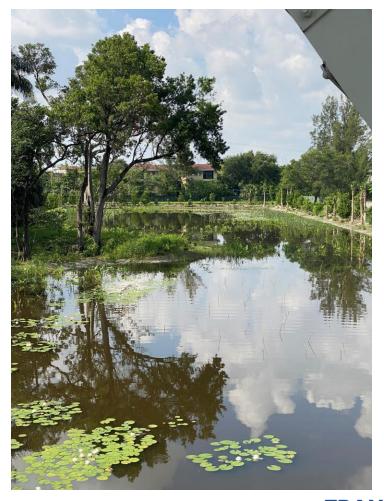
Reassembly on the site

#### A Win-Win

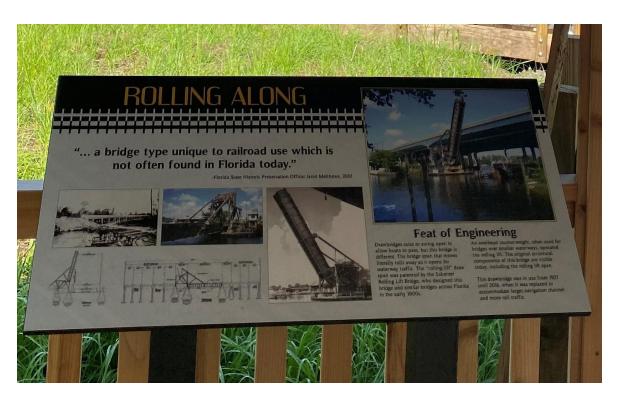
- Preservation of the historic bridge
- Timely completion of the PD&E Process
- Interpretive panels and kiosk
- Wetland ponds and plants
- Passive recreation and habitat creation







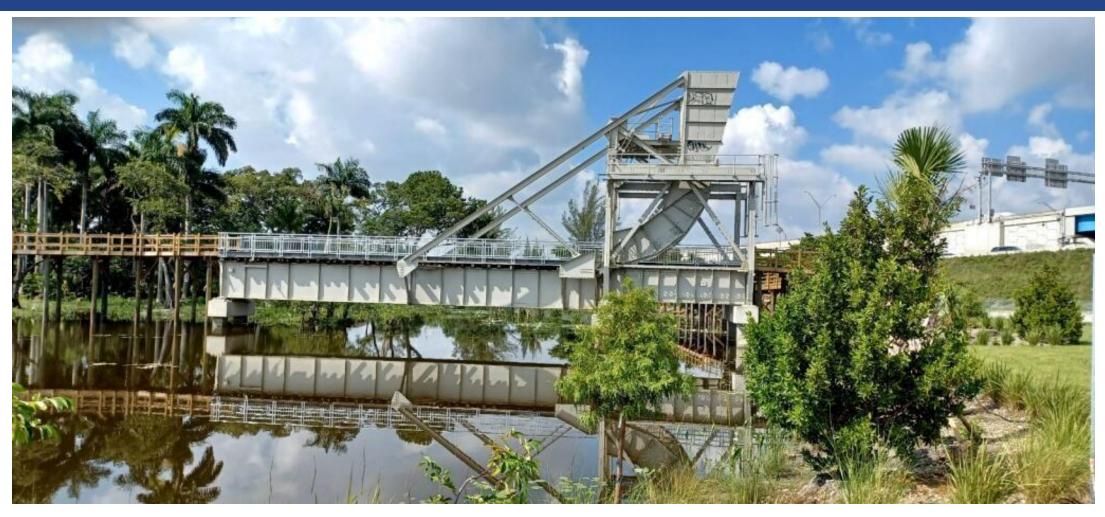
TRANSPORTATION SYMPOSIUM











#### **Lessons Learned**

- Early identification of potential NEPA issues is critical.
- "Think outside the box" for mitigation solutions.
- Seek partners.
- Ensure that commitments are actually achievable.

#### Questions?

Thank you for your attention!





June 13-14, 2024



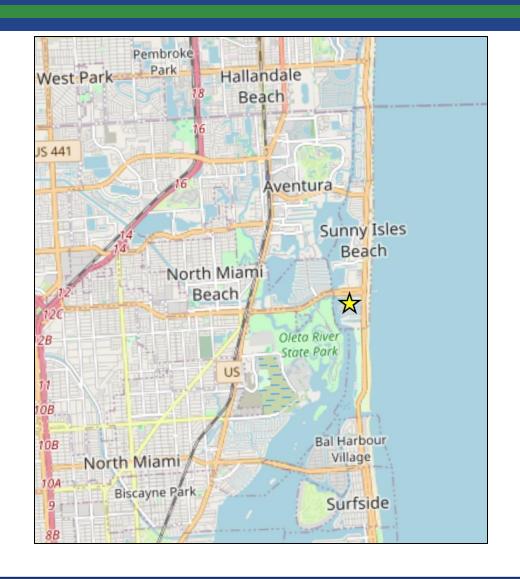


#### **Good Faith Consultation and Resilient Processes: Navigating Cultural Resource Mitigation**

Victoria Vogt and Max Adriel Imberman **FDOT District 6** 



#### **Atlantic Isle Bridge - Project Location**





TRANSPORTATION SYMPOSIUM

#### **Purpose and Need**



Address structural deficiencies

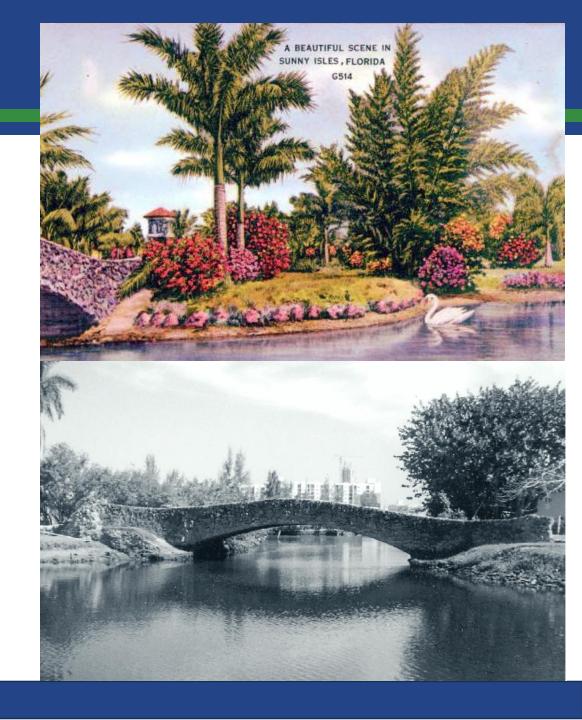
Provide a safe and usable route for the public

Improve functional operations

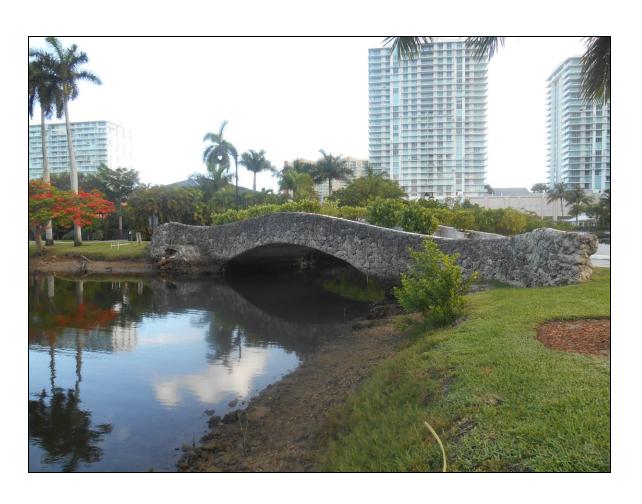
**TRANSPORTATION** SYMPOSIUM

## Atlantic Isle Historic Significance

- Atlantic Isle was constructed during the Florida Boom Period (1917–1929) and the original design included these resources:
  - Atlantic Island Bridge
  - Lake of the Isles (Lagoon)
  - Atlantic Island Park
- Atlantic Island Bridge Historic Elements
  - Only remaining historic bridge on the island
  - Oolitic limestone construction material
  - Irregular whitewashed stucco on the bridge interior
  - Early example of an arch deck bridge



#### **Photos of Atlantic Island Bridge**





TRANSPORTATION SYMPOSIUM

#### **Identified Cultural Resources**



- August 23, 2016 SHPO determined the Atlantic Island Bridge NRHP-eligible
- February 24, 2022 SHPO determined the Atlantic Island Resource Group eligible
- Atlantic Island Resource Group includes:
  - Atlantic Island Bridge
  - Lakes of the Isles (Lagoon)
  - Atlantic Island Park



#### **Process Challenges**



- Off-System Project
  - Additional coordination required
    - Local Funding Agreement (LFA)
- Navigating adverse effects and mitigation through Federal regulations
- Adjustments to the project schedule during PD&E

## Section 106 and Good Faith Consultation

- Cultural Resource Assessment Survey (CRAS) received SHPO concurrence on February 4, 2022.
- Section 106 Case Study and Determination of Effects received SHPO concurrence on May 12, 2023.
- Public Involvement occurred throughout PD&E Process
  - 3 public meetings
  - 2 Affected Parties Consultation Meetings
  - 2 City of Sunny Isles Beach Historic Preservation Board Meetings





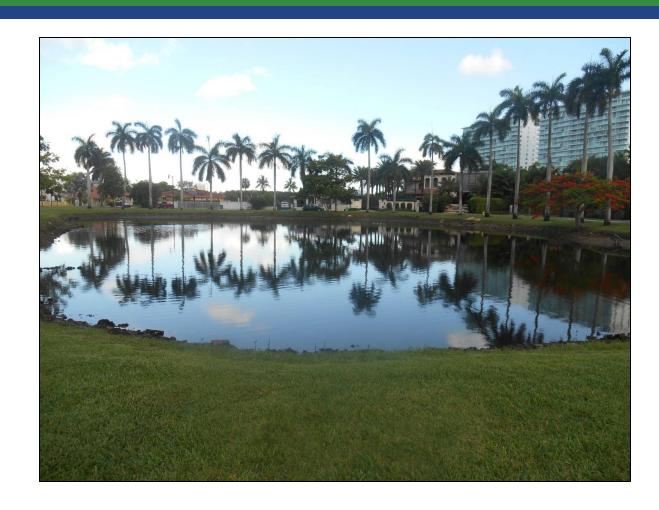
## Section 4(f) of the U.S. Dept. Of Transportation Act



Section 4(f) refers to the original section within the **U.S. Department of Transportation Act of 1966** which established the requirement for consideration of public park and recreational lands, wildlife and waterfowl refuges, and historic sites in transportation project development.

#### **Individual Section 4(f) Analysis**

- Section 4(f) Resources Include:
  - Atlantic Island Bridge
  - Lake of the Isles
  - Atlantic Island Park
  - Atlantic Island Resource Group
- Alternatives were Evaluated under Section 4(f)
- Section 4(f) Analysis Completed in Connection with Section 106
- Evaluated:
  - Avoidance Alternative
  - Least Harm Alternative
- No Feasible And Prudent Avoidance Alternative



#### Minimization and Mitigation Measures

- The Section 106 MOA between FDOT and SHPO was executed on April 10, 2024.
- The MOA included the following mitigation measures:
  - Incorporate Historical Design Elements into the New Bridge, as feasible
  - City of Sunny Isles Beach and SHPO provided an opportunity to comment during the design phase
  - Historic American Engineering Record (HAER) and Historic American Landscape Survey (HALS) Documentation - Bridge, Park, & Lagoon
  - State Historic Marker History of Atlantic Isles Design, Bridge, Park, & Lagoon



#### **Process Successes**

- Affected Parties Consultation Meetings and coordination with the local Historic Preservation Board
- Preservation of key aesthetic elements of the bridge as detailed in a Memorandum of Agreement (MOA)
- Management of project schedule impacts to meet Location Design Concept Approval (LDCA)



Thanks for attending!

Do you have any questions?

Jennifer Marshall, P.E.

Director

Office of Environmental Management

Phone: (850) 414-4316

Jennifer.Marshall@dot.state.fl.us

Victoria Vogt, M.S., FCCM

**Cultural Resources Coordinator** 

District 6

Phone: (305) 470-5420

Victoria.Vogt@dot.state.fl.us

#### **Lynn Kelley**

Senior Environmental Specialist

District 4

Phone: (954) 777-4334

Lynn.Kelley@dot.state.fl.us

Max Adriel Imberman, M.A.

**Architectural Historian** 

Phone: (813) 330-9111

Max Imberman@Janus-Research.com



## DID YOU COVA ?

Wearing the right helmet makes a safety difference!

66% of Florida riders ages 50+ involved in fatal motorcycle crashes were not wearing USDOT- compliant helmets.\*

RIDER AGE GROUPS USING NON-COMPLIANT HELMETS

**Under Age 30** 

35%

**Age 30-49** 

56%

Age Age 50+

66%



Scan QR Code to find your perfect (and safe) fit!





\* Sourced from Florida crash data between 2015 and 2019.

