



# **PINE ISLAND ROAD FROM GRIFFIN ROAD TO NOVA DRIVE**

## **Roadway Capacity Expansion Project**

Public Meeting No. 2

Old Davie School House

6650 Griffin Road

Davie, Florida 33314

October 20, 2022

from 6:30 pm to 8:30 pm



## BROWARD COUNTY

**Senator Steven Geller**

**Currently Serving as the Broward County District 5 Commissioner including portions of the Broward Municipal Services District, Davie, Plantation, Southwest Ranches, Sunrise and all of Cooper City**



**R.J. BEHAR & COMPANY, INC. (COUNTY DESIGN CONSULTANT)**

## PRESENTER

**Robert J. Behar, P.E.**

**Design Project Manager**

## **BROWARD COUNTY PUBLIC WORKS**

**Trevor Fisher, P.E., Director, Public Works Department**

## **BROWARD COUNTY HIGHWAY CONSTRUCTION AND ENGINEERING STAFF**

**Richard Tornese, P.E., Director, Highway Construction & Engineering**

**Carolina Bustamante, P.E., Project Manager**

**Manuel Fontan, P.E., P.T.O.E., Project Manager Supervisor**

## **BROWARD COUNTY TRAFFIC ENGINEERING STAFF**

**Scott Brunner, P.E., Director, Traffic Engineering**

**Carmelo Caratozzolo, P.E., Traffic Operations Engineer**

## **R.J. BEHAR & COMPANY, INC. SUPPORTING STAFF**

**Juan Vazquez, P.E.**

**Paola Riveros, P.E.**

**John Izquierdo, P.E.**

**Nanette Akyaz-Gomez, LEED AP ND**

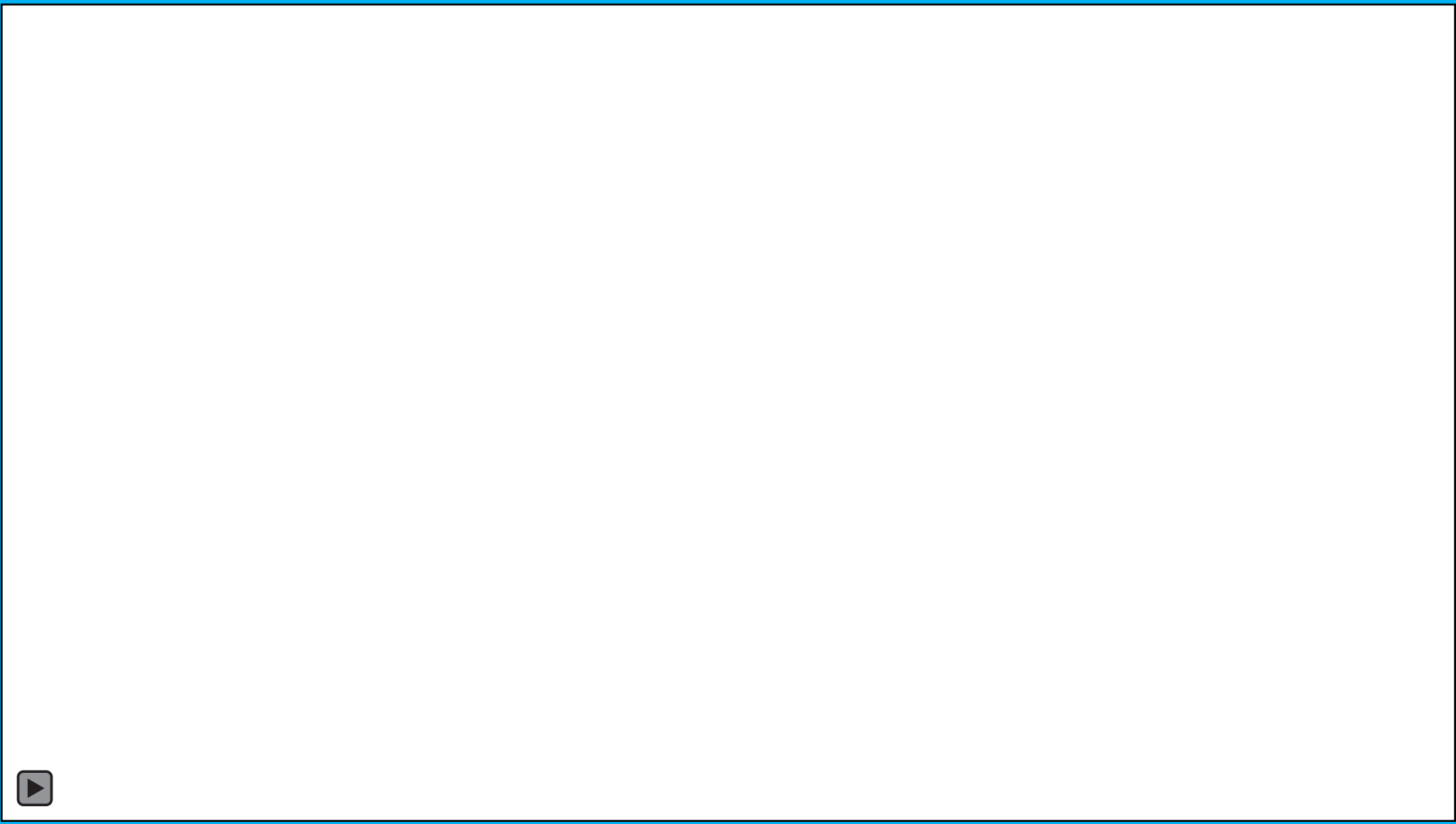
**Dereth Behar**

## **METRIC ENGINEERING, INC. – SUPPORTING STAFF (NOISE WALL)**

**Sergio Rios**

# PRESENTATION AGENDA

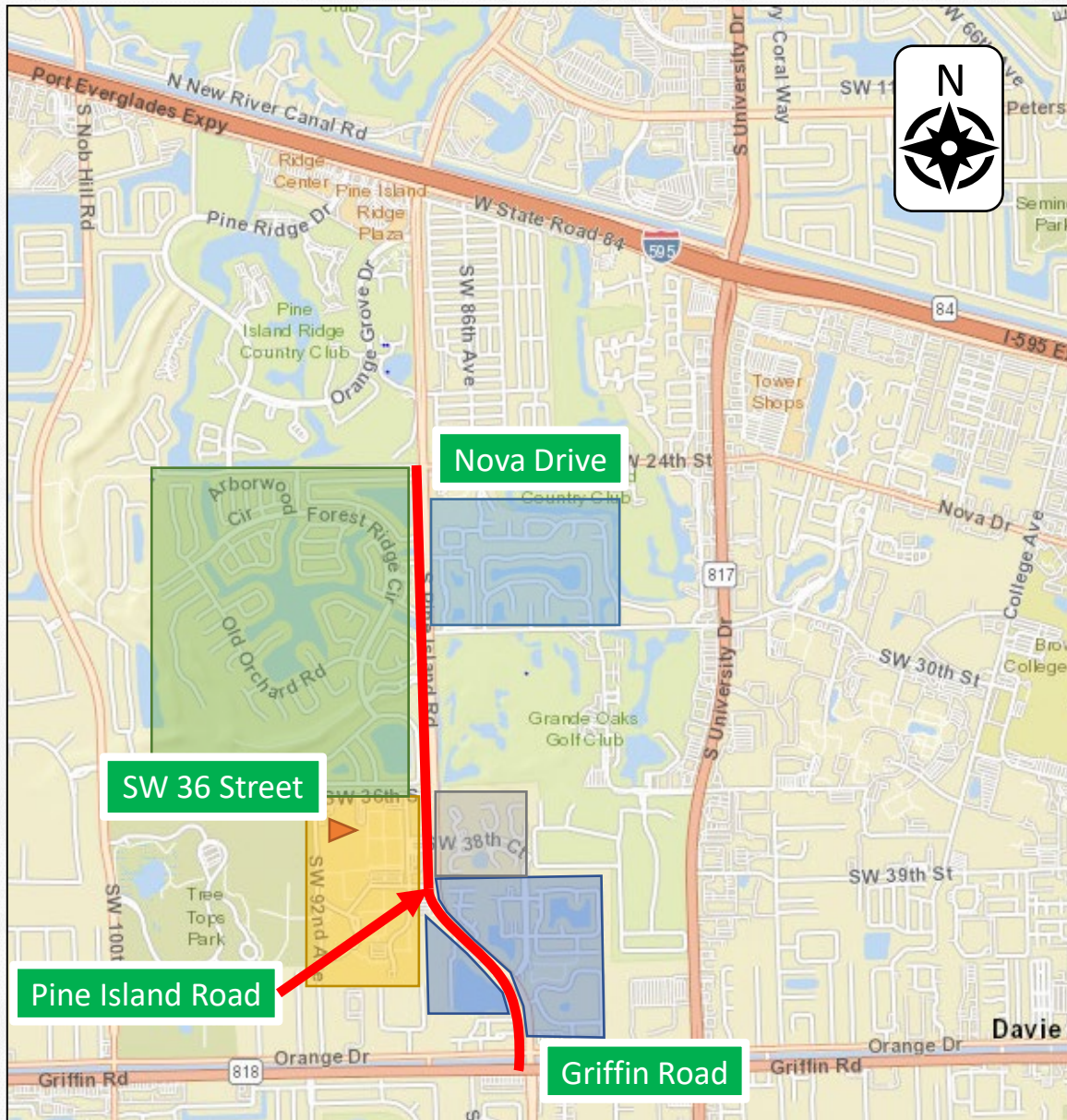
- 1. MAP Broward Video**
- 2. Project Location**
- 3. Project Justification**
- 4. Project Scope**
- 5. Typical Sections – Status of Plans**
- 6. Signalization**
- 7. Right-of-Way Dedication**
- 8. Noise Walls**
- 9. Landscaping**
- 10. Project Schedule**



# PROJECT LOCATION

## Pine Island Road from Griffin Road to Nova Drive

### Communities and Other Landmarks

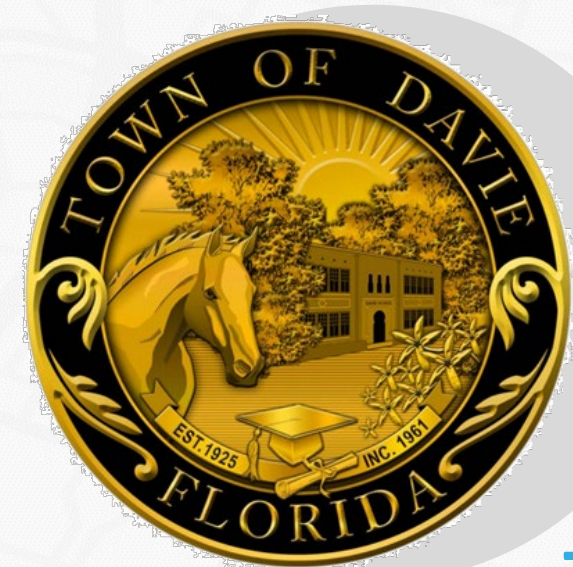


	Forest Ridge	<ul style="list-style-type: none"> <li>• Reflections</li> <li>• Old Country Manor</li> <li>• Woods of Rolling Hills</li> <li>• Alpine Woods</li> <li>• Calico Country</li> <li>• Pine Island Bay</li> <li>• Cimarron</li> </ul>
	Bamford Park	
	Silver Ridge Elementary School	
	<ul style="list-style-type: none"> <li>• The Harvest</li> <li>• Arrowhead Country Homes</li> <li>• Rolling Hills Lake Estates</li> <li>• Oak View Estates</li> </ul>	
	<ul style="list-style-type: none"> <li>• Isla Merita</li> </ul>	

# PROJECT JUSTIFICATION

❖ **Metropolitan Planning Organization**  
Adopted FY 2018/2019 – FY 2022/2023

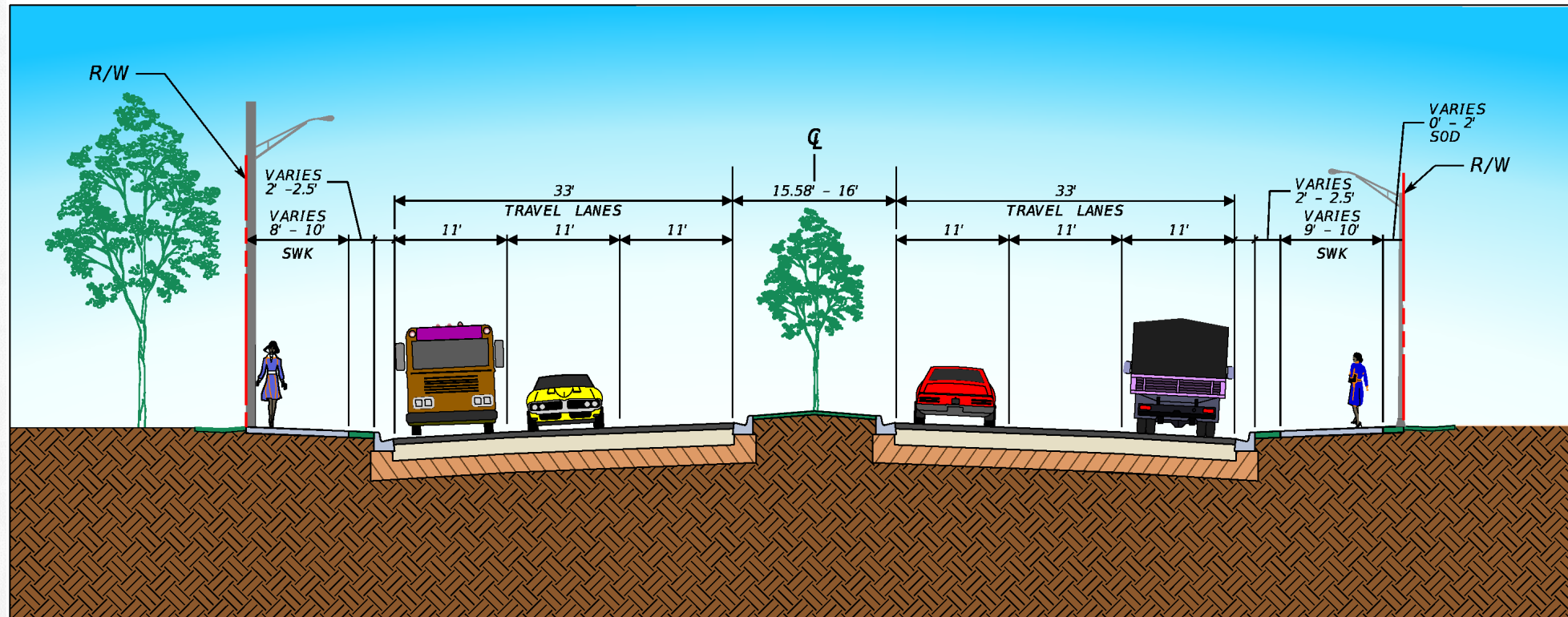
❖ **Town of Davie**  
Confirmed Support –  
January 24, 2017



# PROJECT SCOPE

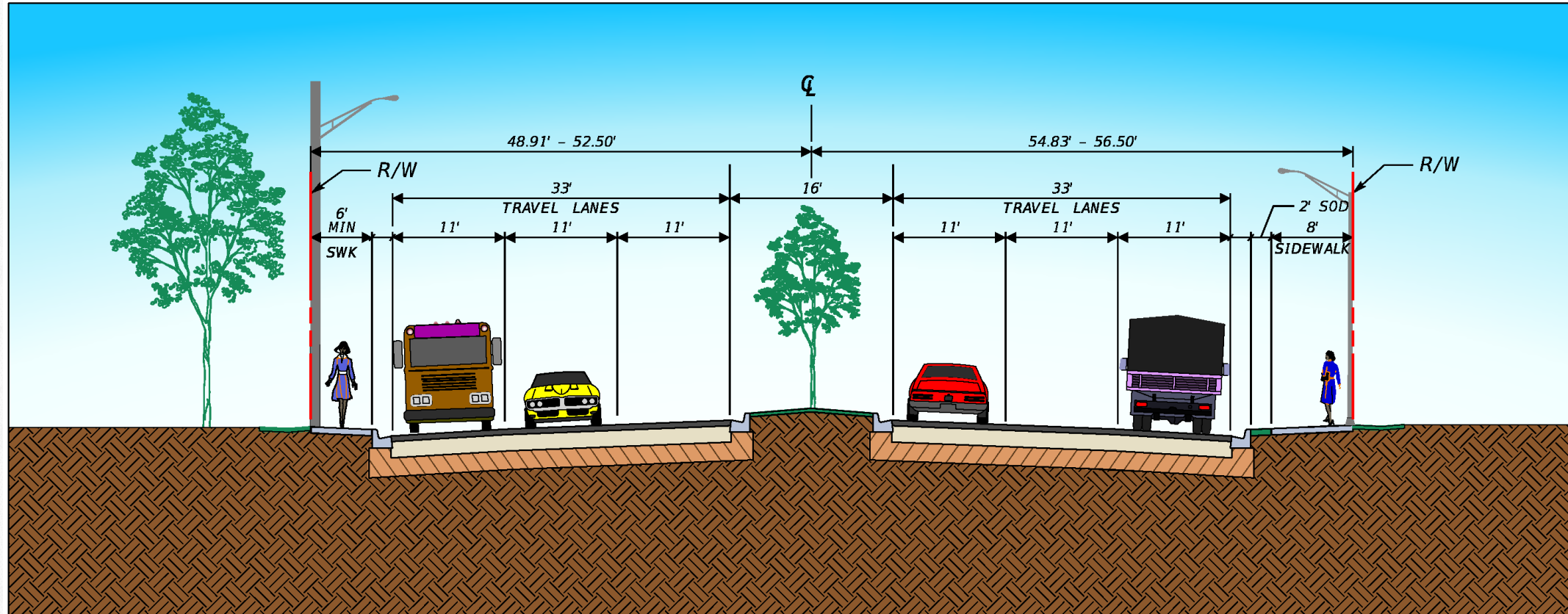
- **Widen Pine Island Road from 4 Lanes to 6 Lanes**
- **New Drainage System**
- **Accessibility Improvements**
- **Shared-Use Path**
- **Modify Signalized Intersection at Griffin Road, Orange Drive, SW 30<sup>th</sup> Street, SW 36<sup>th</sup> Street, and Nova Drive**
  - **Signal Warrant Study at: Forest Ridge Boulevard & Alpine Woods Road**
- **New Bulkhead Wall Along the Existing Canal to the East**
- **New Signing & Pavement Marking**
- **Potential Noise Wall**
- **New Lighting**
- **Landscaping**

# TYPICAL SECTION PINE ISLAND ROAD



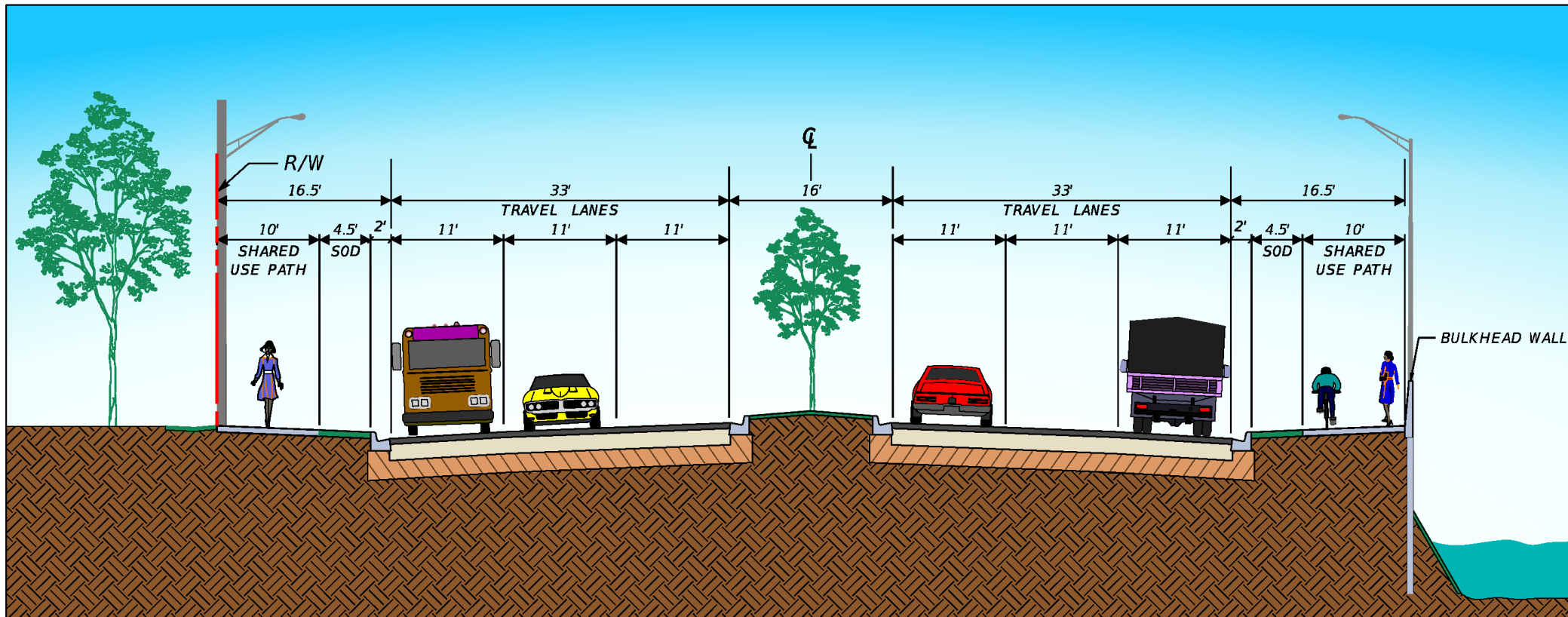
## TYPICAL SECTION Griffin Road to Bamford Park & Bamford Park to SW 36<sup>th</sup> Street

# TYPICAL SECTION PINE ISLAND ROAD



## TYPICAL SECTION Vicinity of Bamford Park

# TYPICAL SECTION PINE ISLAND ROAD



# TYPICAL SECTION

## North of SW 36<sup>th</sup> Street to Nova Drive

# SHARED-USE PATH NORTHBOUND



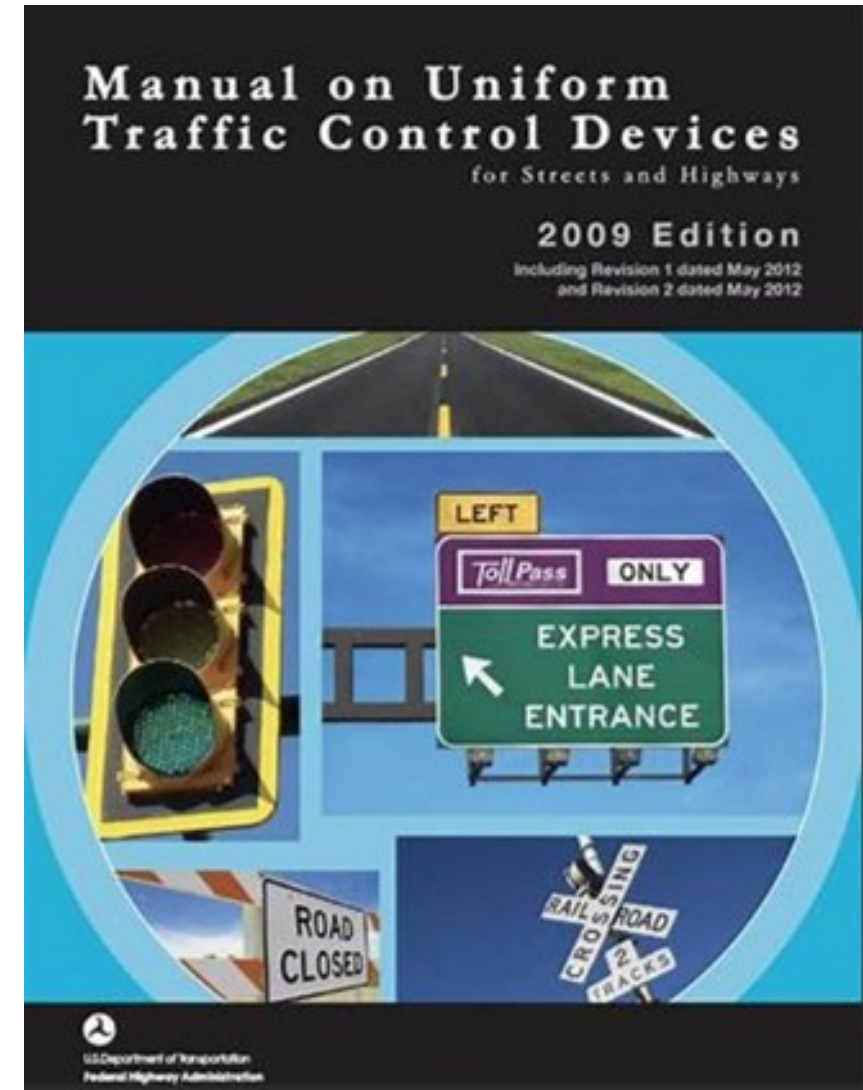
# SHARED-USE PATH SOUTHBOUND



# SIGNALIZATION

## SIGNAL APPROVAL (WARRANT) PROCESS

- An engineering study shall be performed.
- Signal warrant studies are performed in accordance with the Manual on Uniform Traffic Control Devices.



# SIGNALIZATION

## SIGNAL APPROVAL (WARRANT) PROCESS

**MUTCD Requires Nine Traffic Signal Warrants to be Evaluated, as Applicable:**

- **Warrant 1, Eight-Hour Vehicular Volume**
- **Warrant 2, Four-Hour Vehicular Volume**
- **Warrant 3, Peak Hour**
- **Warrant 4, Pedestrian Volume**
- **Warrant 5, School Crossing**
- **Warrant 6, Coordinated Signal System**
- **Warrant 7, Crash Experience**
- **Warrant 8, Roadway Network**
- **Warrant 9, Intersection Near at Grade Crossing**



# SIGNALIZATION

## SIGNAL APPROVAL (WARRANT) PROCESS

- Most traffic agencies, including Broward County and FDOT, require at least Warrant 1 to be satisfied.
- If Warrant 1 is not satisfied, Warrants 2 thru 9 may be considered.
- The criteria applied to the volume-based warrants may be reduced based on engineering judgement considering such factors:
  - Crash History
  - Speed
  - Intersection Geometry
  - Other Safety and Operational Factors

# SIGNALIZATION

## PINE ISLAND ROAD & FOREST RIDGE BOULEVARD

Warrants	Satisfied?
1. Eight-Hour Vehicular Volume	Yes
2. Four-Hour Vehicular Volume	Yes
3. Peak Hour	N/A
4. Pedestrian Volume	N/A
5. School Crossing	N/A
6. Coordinated Signal System	N/A
7. Crash Experience	No
8. Roadway Network	N/A
9. Intersection Near a Grade Crossing	N/A

### RESULTS:

- Posted speed = 40 MPH
- 85th % Speeds:
  - NB=48 MPH
  - SB=57 MPH
- 7 crashes in 5 years

# SIGNALIZATION STUDY RESULTS

## PINE ISLAND ROAD & FOREST RIDGE BOULEVARD

- Warrants 1 and 2 – Satisfied
- **ADDITIONAL ROAD-CHARACTERISTIC CONSIDERATIONS DUE TO THE EXPANSION PROJECT:**
  - New thru-lane increases travel distance to median for EB left turn motorists
  - Median width is reduced from 28.5 feet to 16.0 feet

# RECOMMENDATION

## PINE ISLAND ROAD & FOREST RIDGE BOULEVARD

### Install Traffic Signal at Forest Ridge Boulevard

- Requires Public Right-of-Way Dedication

### Operational Impacts:

- May introduce added delays on Pine Island Road in this vicinity based on operational analysis.
- Outbound traffic from Forest Ridge Boulevard may experience longer waits during off peak hours.

# SIGNALIZATION

## PINE ISLAND ROAD & ALPINE WOODS ROAD

Warrants	Satisfied?
1. Eight-Hour Vehicular Volume	No
2. Four-Hour Vehicular Volume	No
3. Peak Hour	N/A
4. Pedestrian Volume	N/A
5. School Crossing	N/A
6. Coordinated Signal System	N/A
7. Crash Experience	No
8. Roadway Network	N/A
9. Intersection Near a Grade Crossing	N/A

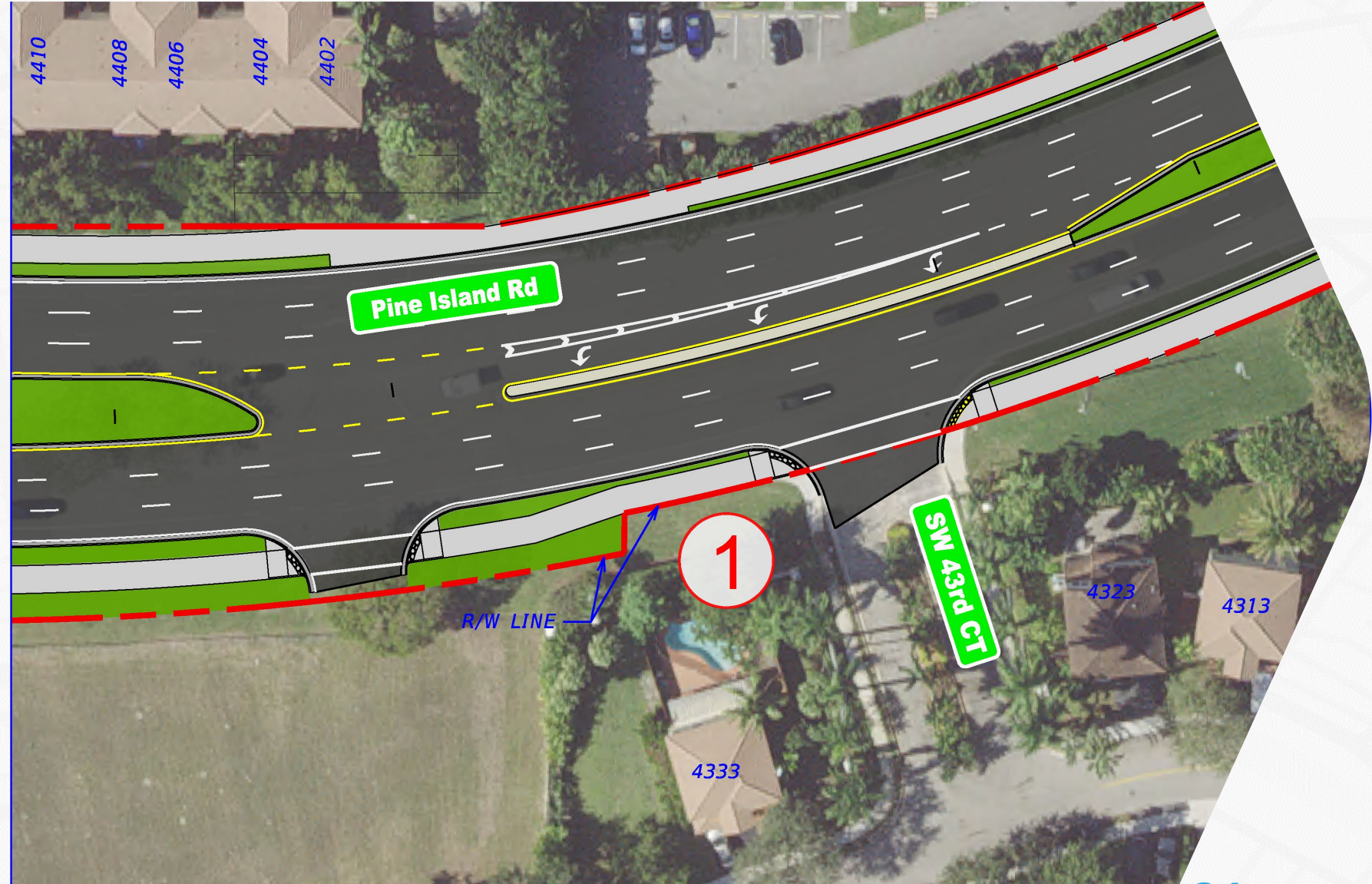
### RESULTS:

- Posted speed = 40 MPH
- 85<sup>th</sup> % Speeds:
  - NB=43 MPH
  - SB=52 MPH
- 4 crashes in 5 years
- No Traffic Signal Warrants Satisfied

# REFLECTIONS

## SW 43<sup>rd</sup> Court

- Required to Accommodate Right Turn Lane into SW 43<sup>rd</sup> Court
- Reflections HOA to Contact Broward County HCED
- Deadline for Right-of-Way Dedication – February 2023

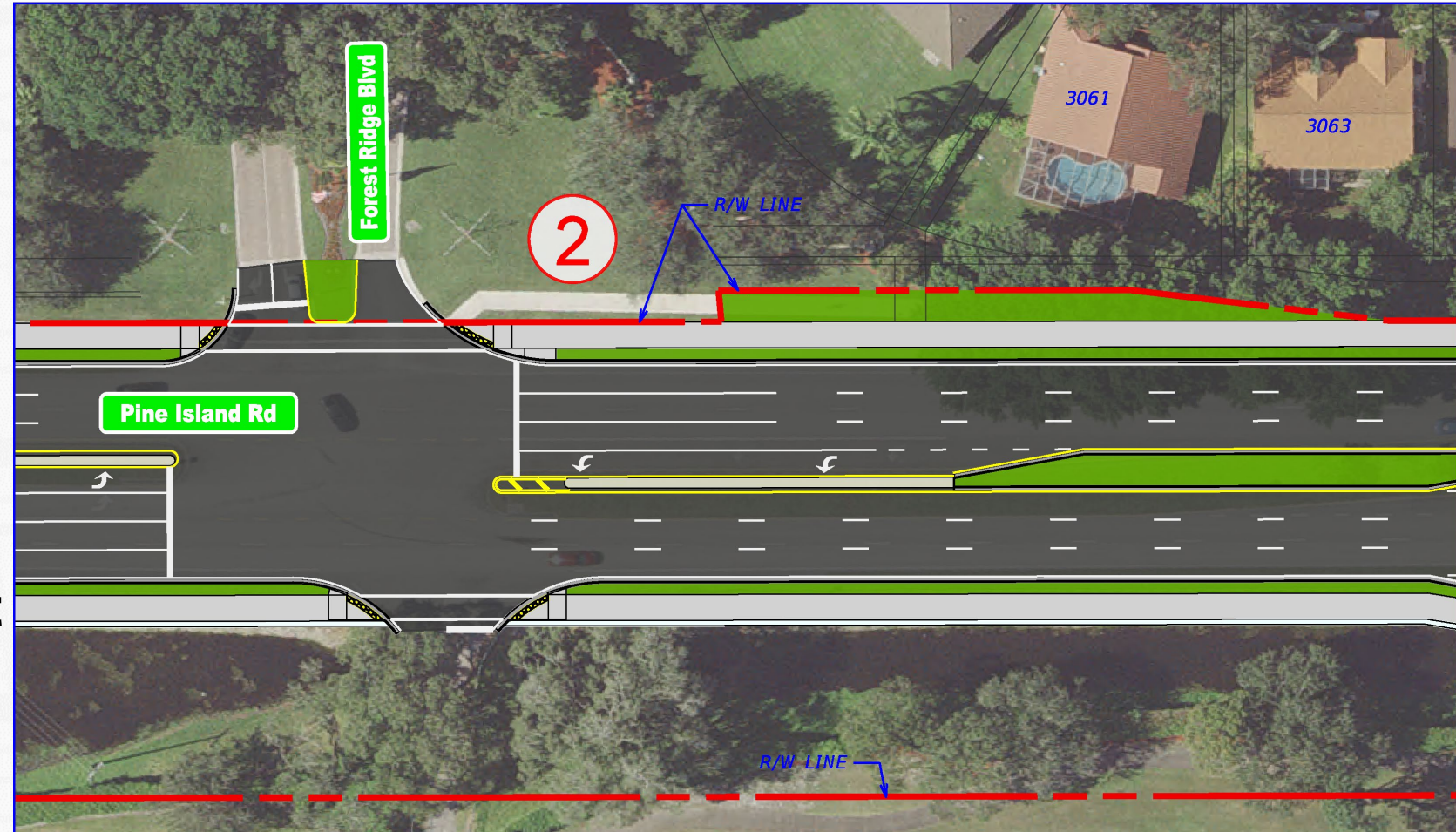


# RIGHT-OF-WAY DEDICATION

## FOREST RIDGE HOA

### Forest Ridge Boulevard

- Required to Accommodate Right Turn Lane into Forest Ridge Boulevard
- Required for the County to Design and Construct Traffic Signal
- Forest Ridge HOA to Contact Town of Davie Engineering



**Deadline for Right-of-Way Dedication – February 2023**

# NOISE WALLS

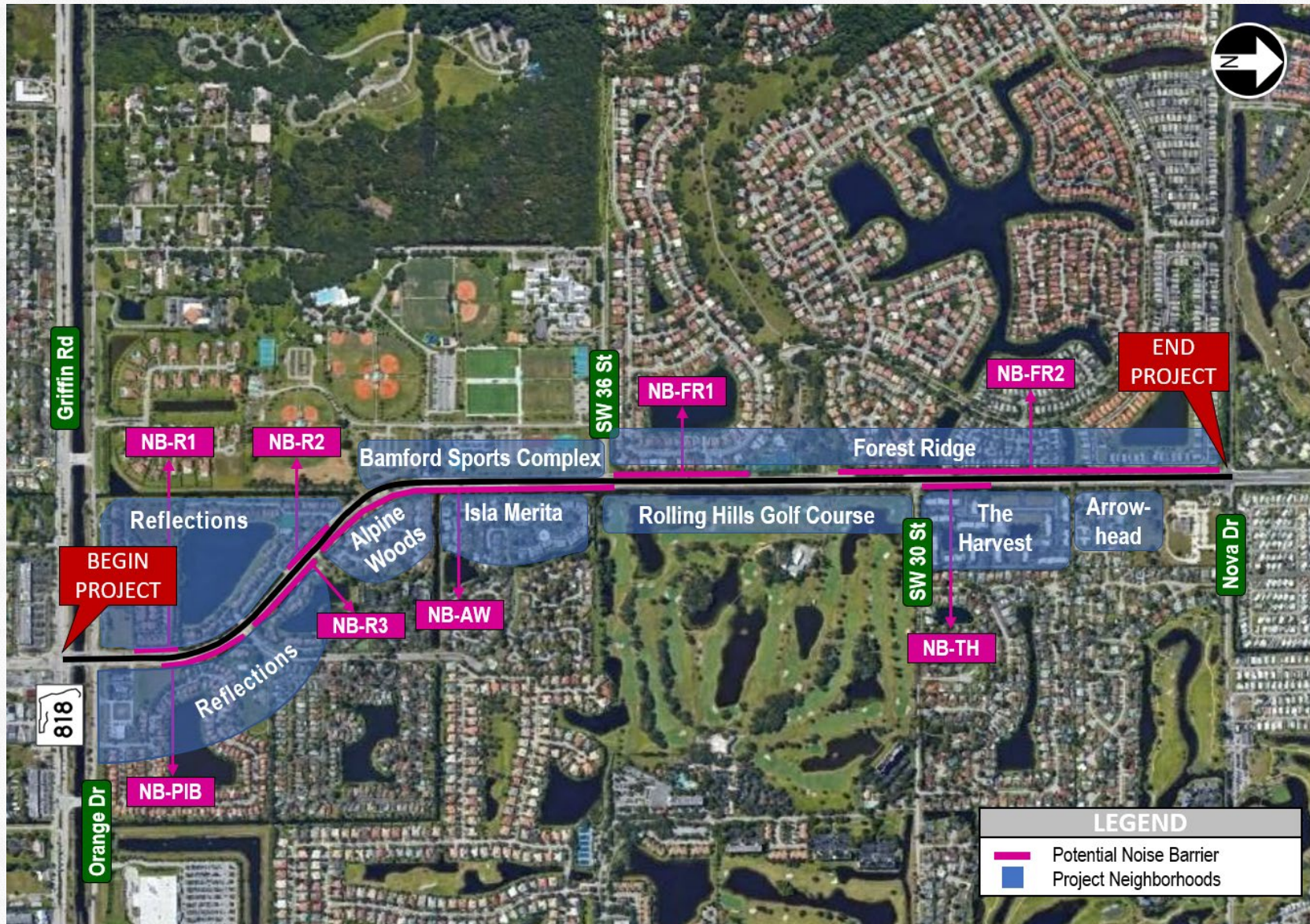


Residents should contact their HOA to request noise walls, the HOA to contact the Town of Davie, and the Town will Contact the County.

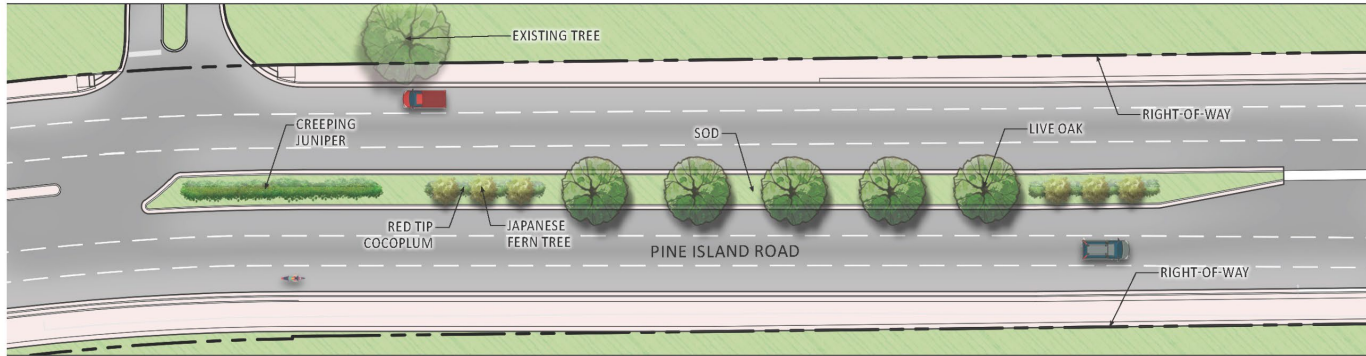
**\*As per County Administrative Code:**  
The request to install sound protective devices must be made by the Town of Davie to the County. The Town must provide the right-of-way or easements necessary for such construction. The Town must provide 50% of the construction cost. The Town must maintain the noise wall.

**Deadline for Noise Wall Requests:  
December 15, 2022**

# NOISE WALL POTENTIAL LOCATIONS



# LANDSCAPING



MEDIAN LANDSCAPE TYPICAL



MEDIAN LANDSCAPE TYPICAL

## PLANT SCHEDULE

### TREES/PALMS

#### SCIENTIFIC NAME

- \* CLUSIA ROSEA
- FILICUM DECIPENS
- LAGERSTROEMIA L. 'PINK'
- \* QUERCUS VIRGINIANA
- \* SABAL PALMETTO

\* NATIVE SPECIES

#### COMMON NAME

- AUTOGRAPH TREE
- JAPANESE FERN TREE
- CRAPE MYRTLE
- SOUTHERN LIVE OAK
- SABAL PALM

### SHRUBS

#### SCIENTIFIC NAME

- \* CHRYSOBALANUS L. 'RED TIP'
- FICUS M. 'GREEN ISLAND'
- \* MUHLENBERGIA CAPILLARIS
- JUNIPERUS HORIZONTALIS

#### COMMON NAME

- RED TIP COCOPLUM
- GREEN ISLAND FICUS
- PINK MUHLY GRASS
- CREeping JUNIPER



SABAL PALM



AUTOGRAPH TREE



CRAPE MYRTLE



JAPANESE FERN TREE



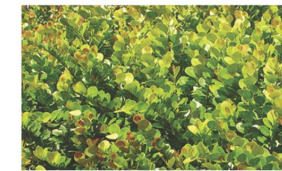
SOUTHERN LIVE OAK



GREEN ISLAND FICUS



PINK MUHLY GRASS



RED TIP COCOPLUM



CREeping JUNIPER

10.04.2022

# PROJECT SCHEDULE

## PROJECT MILESTONES

### ★ DESIGN

Survey, Geotechnical  
Public Meeting 2  
Plans Development  
Permit Approvals

- Complete
- October 20, 2022
- March 2022 to November 2023
- March 2022 to October 2023

### ★ CONSTRUCTION

Begin Tree Relocation  
Begin Construction (Roadway)  
End Construction

- Fall 2023
- Spring 2024
- Summer 2026

# THANK YOU FOR ATTENDING!

Thank you for your interest in the Pine Island Road Improvements.

**POINTS OF CONTACT FOR COMMENTS, QUESTIONS, OR CONCERNS:**

R.J. Behar & Company, Inc.

Design Consultant

**Robert Behar, PE**

Phone: 954-680-7771

Email: [pineislandroad@rjbehar.com](mailto:pineislandroad@rjbehar.com)

Email: [bbehar@rjbehar.com](mailto:bbehar@rjbehar.com)

**Comment Cards are Located in the Back of the Room**

**Information Related to the Project Can be Found at the Link Below:**

<https://www.broward.org/BCEngineering/Pages/CapitalProjectsPublicInvolvement.aspx>