December 2020

Preliminary Engineering Report

SR 826/Palmetto Expressway
From South of NW 36th Street (MP 8.355) to North of NW 154th Street (MP 17.950)
Project Development & Environment Study
Miami-Dade County, Florida

Financial Management Numbers: 447165-1-22-01, 441830-1-22-01, 441831-1-22-01
Federal Aid Project Number: N/A
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PRELIMINARY ENGINEERING REPORT

Florida Department of Transportation

District VI

SR 826 / Palmetto Expressway
Project Development & Environment (PD&E) Study from South of NW 36th Street to North of NW 154th Street

Miami-Dade County, Florida

Financial Project ID Number: N/A

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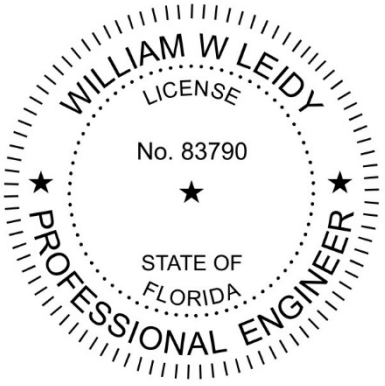
The environmental review, consultation, and other actions required by applicable federal environmental laws for this project are being, or have been, carried out by FDOT pursuant to 23 U.S.C. § 327 and a Memorandum of Understanding dated December 14, 2016, and executed by FHWA and FDOT.



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Abbreviations

AADT	Average Annual Daily Traffic
AASHTO	American Association of State Highway and Transportation Officials
ADA	American with Disabilities Act
AMS	Arterial Management Services
APE	Area of Potential Effect
ATMS	Advanced Transportation Management Systems
ATS	Automatic Transfer Switches
ATSC	Adaptive Traffic Signal Control
BDR	Bridge Development Report
BHP	Borehole Permeability Tests
BMAP	Basin Management Action Plan
BTTS	Bluetooth Travel Time System
CARS	Crash Analysis Reporting System
CCTV	Closed Circuit Television
CD	Collector-Distributor
CDR	Concept Development Report
CFR	Code of Federal Regulation
CNEs	Common Noise Environments
CRA	Community Redevelopment Agency
DMS	Dynamic Messaging Signs
DOA	Determination of Applicability
EB	Eastbound

EFH	Essential Fish Habitat
EL	Express Lanes
EPA	United States Environmental Protection Agency
ESA	Endangered Species Act
ETDM	Efficient Transportation Decision Making
FDEP	Florida Department of Environmental Protection
FDM	FDOT Florida Design Manual (2020)
FDOT	Florida Department of Transportation
FEMA	Federal Emergency Management Agency
FHWA	Federal Highway Administration
FO	Fiber Optic
FOC	Fiber Optic Cable
FPID	Financial Project Identification Number
FWC	Florida Fish and Wildlife Commission
FWRA	Food Waste Reduction Alliance
GP	General Purpose
HD	High Definition
HOA	Homeowner's Association
HOV	High Occupancy Vehicles
ID	Identification
IOAR	Interchange Operational Analysis Report
ITS	Intelligent Transportation System
LDCA	Location and Design Concept Acceptance

LHR	Location Hydraulic Report
LOS	Level of Service
LFR	Load Factor and Resistance
LRE	Long Range Estimate
MDT	Miami-Dade Transit
MLOU	Methodology Letter of Understanding
MOEs	Measures of Effectiveness
MP	Milepost
mph	miles per hour
MPO	Metropolitan Planning Organization
MSE	Mechanically Stabilized Earth
MVDS	Microwave Vehicle Detection System
NAC	Noise Abatement Criteria
NAVD	North American Vertical Datum
NB	Northbound
NBI	National Bridge Inventory
NE	Northeast
NEPA	National Environmental Policy Act
NFHL	National Flood Hazard Layer
NGVD	National Geodetic Vertical Datum
NHS	National Highways System
NMFS	National Marine Fisheries Service
NOAA	National Oceanic and Atmospheric Administration

NRCS	Natural Resources Conservation Service
NRE	Natural Resources Evaluation
NSR	Noise Study Report
NW	Northwest
O-D	Origin - Destination
OEM	Office of Environmental Management
OWJ	Official with Jurisdiction
PD&E	Project Development and Environment Study
PPM	Plans Preparation Manual
PSC	Prestressed Concrete
PTZ	Pan-Tilt-Zoom
RSS	Ramp Signaling System
RSC	Ramp Signal Cabinets
RTMC	Regional Transportation Management Centers
SB	Southbound
S-DMS	Lane Status Dynamic Messaging Sign
SE	Southeast
SERPM	Southeast Florida Regional Planning Model
SFWMD	South Florida Water Management District
SHGWT	Seasonal High Groundwater Table
SHPO	State Historic Preservation Office
SIMR	Systems Interchange Modification Report
SIS	Strategic Intermodal System

SR	State Road
SW	Southwest
SWEPT	Statewide Environmental Project Tracker
T-DMS	Toll Amount Dynamic Messaging Sign
TMDL	Total Maximum Daily Load
TSM&O	Transportation Systems Management and Operations
US-	U.S. Route or U.S. Highway
USACE	United States Army Corps of Engineers
USCG	United States Coast Guard
USDA	United States Department of Agriculture
USFWS	United States Fish and Wildlife Service
vpd	vehicles per day
VoIP	Voice over Internet Protocol
WAP	Wireless Access Points
WB	Westbound
WBID	Water body Identification

1.0 Project Summary

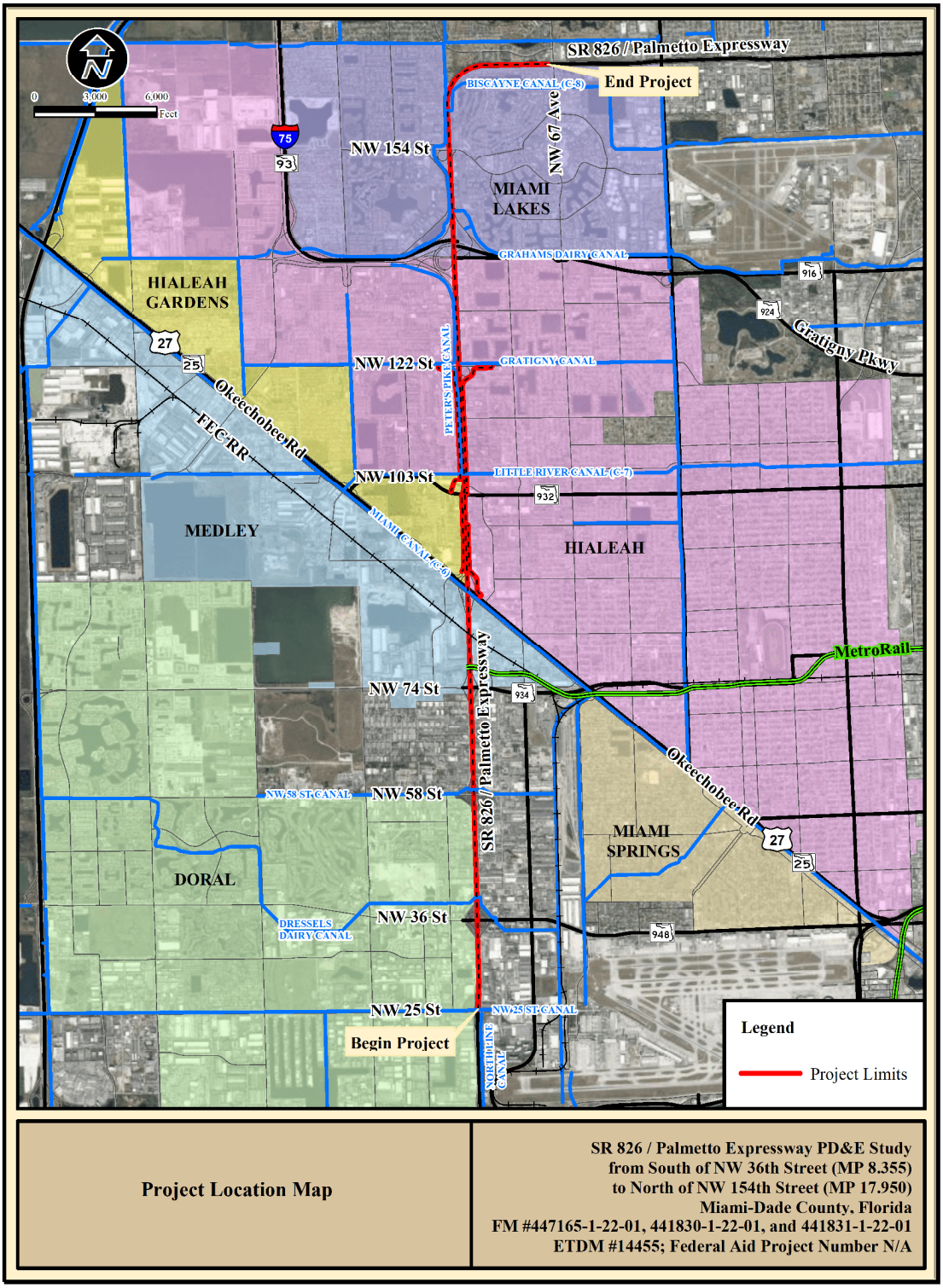
1.1 Project Description

This roadway project involves the addition of general use lanes, conversion of express (managed) lanes to general use lanes, as well as traffic operational and geometrical design improvements on SR 826/Palmetto Expressway from South of NW 36th Street (Milepost (MP) 8.355) to North of NW 154th Street (MP 17.950) within Miami-Dade County. The improvements are proposed to address existing congestion and higher than expected speed differentials between the general purpose (GP) lanes and the express lanes (EL) along the project corridor, as well as provide additional access to the EL system. Connecting population and commercial centers in north-central Miami-Dade County, the project traverses the cities of Doral, Medley, Hialeah Gardens, Hialeah, and Miami Lakes, as well as unincorporated portions of the county. SR 826/Palmetto Expressway connects to essential east-west facilities within north-central Miami-Dade County, including SR 836/Dolphin Expressway, SR 948/NW 36th Street, SR 934/NW 74th Street, US 27/Okeechobee Road, SR 932/NW 103rd Street, and I-75/SR 93 and SR 924/Gratigny Parkway.

The proposed southbound (SB) improvements include modification to the NW 103rd Street westbound (WB) to SB Flyover ramp piers, thereby widening the SR 826 mainline bridge and mechanically stabilized earth (MSE) walls, which will allow for an additional GP lane through the interchange and extension of the auxiliary lane between NW 74th Street and Okeechobee Road interchanges. In an effort to improve the existing weaving condition, three SB bridges (over NW 74th Street, Metrorail, and FEC Rail) are expected to be widened. One SB EL will be converted to provide an additional GP lane, between NW 103rd Street and NW 154th Street by milling and resurfacing, restriping and moving the delineators. In addition, the existing SB EL ingress currently located at north of NW 154th Street is expected to be relocated to NW 103rd Street in order to provide better access to residents in northern Miami-Dade County. Proposed northbound (NB) improvements include widening the mainline within the NW 103rd Street interchange to provide the minimum 10-foot recommended shoulder width for both inside and outside shoulders. In addition, the project includes improvements to the frontage road system on both sides of SR 826/Palmetto Expressway including milling, resurfacing, and construction between Okeechobee Road and NW 122nd Street.

Within the project limits, SR 826/Palmetto Expressway is classified as 'Principal Arterial-Other Freeways and Expressways' and consists of six to eight general use lanes and zero to four express (managed) lanes; the typical section varies throughout the project segment. In addition, SR 826/Palmetto Expressway is part of the state's emergency evacuation network and is a designated Strategic Intermodal System (SIS) highway corridor, providing access via SR 934/NW 74th Street (also known as Hialeah Expressway) and surface streets to the Miami Hialeah FEC Intermodal Terminal, an SIS Freight Rail Terminal. Existing right-of-way along the corridor ranges from approximately 200 feet to 455 feet or more in width near the existing interchanges. Right-of-way is not expected to be required to accommodate the proposed improvements.

Figure 1-1 | Project Location Map



1.2 Purpose and Need

The purpose of this project is to address various roadway deficiencies causing congestion and large speed differentials between GP lanes and EL along the SR 826 corridor. Proposed improvements are anticipated to increase roadway safety, facilitate the movement of people and goods, and increase the capacity in the GP lanes. Another goal of the project is to improve access to the EL system by relocating an ingress point in northern Miami-Dade County. Additionally, the purpose of the project is to improve the geometry of the expressway frontage road system. The need for the project is based on the following criteria:

1.2.1 Roadway Deficiencies: Address Congestion and Speed Differentials

Following the opening of the SR 826 ELs to traffic in September 2019, additional congestion and higher than expected speed differentials between EL (higher speeds) and GP lanes (lower speeds) were observed in both the northbound and southbound directions during peak travel times. Areas identified for improvement include the NW 103rd Street interchange and from NW 74th Street to US 27 in the southbound direction. The issues identified in these areas are caused by geometric and operational deficiencies such as the lack of auxiliary lanes, insufficient ramp lengths, and substandard shoulders.

The implementation of operational improvements to correct the identified roadway deficiencies on SR 826 would improve congestion and better align speeds between the EL and GP lanes. According to the Palmetto Express Lanes Modification Summary Report, an earlier planning study, the proposed improvements would result in a 56% and 42% reduction in travel times for the southbound and northbound GP lanes, respectively. In addition, throughput would increase a combined 58% and 11% in the southbound and northbound directions, respectively. While speed in the EL is not projected to increase, speeds in the GP lanes are forecasted to rise by 26 miles per hour in the southbound direction and 19 miles per hour in the northbound direction. These metrics illustrate how implementation of the potential improvements would address congestion and speed differentials currently caused by roadway deficiencies.

1.2.2 System Linkage: Provide Better Access to the EL System

Currently the southbound EL lanes begin north of NW 154th Street and do not provide southbound ingress for motorists in this area of north-central Miami-Dade County (after NW 67th Avenue). To better facilitate the movement of traffic from this area of increased demand into the EL system, the potential project improvements include relocating the existing EL ingress point from north of NW 154th Street to south of NW 103rd Street. This will create access to the EL system for residents in this portion of Miami-Dade County and create an important linkage to the EL system.

1.3 Commitments

Natural Resources Implementation Measures

Based on the field and literature reviews outlined in the NRE, federally listed or state-listed protected species have the potential to occur within the project study area. In order to ensure that the proposed project will not adversely impact these species, the FDOT will adhere to the following measures:

- The contractor will be advised of state and local law regarding the harassment of crocodiles prior to the commencement of and during construction activities.
- While mitigation is not anticipated, any adverse impacts to suitable foraging habitat for the federally listed wood stork for which mitigation is deemed necessary will be mitigated through the purchase of credits from a FWS-approved mitigation bank pursuant to Section 373.4137, FS or as otherwise agreed to by the FDOT and the FWS.
- Should protected plant species be identified within the project impact area during the design and permitting phase, coordination will be initiated with the FDACS or other appropriate agencies to allow for relocation to adjacent habitat or other suitable protected lands prior to construction.
- During the construction phase of this project, the FDOT will implement the Standard Specifications for Road and Bridge Construction and other BMPs to avoid, where possible, and otherwise minimize adverse impacts to wetlands/surface waters and water quality within the project limits to the maximum extent practicable.
- Manatee exclusion grating will be added for the following existing outfalls which are part of the proposed stormwater management system:
    - Miami Canal (C-6): Station 482+52.12 - 60” pipe
    - Miami Canal (C-6): Station 483+53.87 - 60” pipe
    - Miami Canal (C-6): Station 486+24.20 - two (2) 36” pipes
    - Little River Canal (C-7): Station 540+84.00 - 72” pipe

Natural Resources Commitments

Based on the field and literature reviews outlined in the NRE, federally listed or state listed protected species have the potential to occur within the project study area. In order to assure that the proposed project will not adversely impact these species, the FDOT will adhere to the following commitments:

- Prior to commencing construction activities, the FDOT is committed to re-surveying the project corridor for features that could serve as potential roosting habitat and signs of the Florida bonneted bat. If any signs of the Florida bonneted bat are observed, the FDOT is committed to reinitiating consultation with the FWS to determine the appropriate course of action.
- During the construction phase of this project, the FDOT will adhere to the most recent version of the FWS’ Standard Manatee Conditions for In-Water Work to minimize the potential for adverse effects.

- During the construction phase of this project, the FDOT will adhere to the most recent version of the FWS' Standard Protection Measures for the Eastern Indigo Snake to minimize the potential for adverse effects.

Noise Commitments

- Construction noise and vibration impacts to the project corridor will be minimized by adherence to the controls listed in the latest edition of the FDOT's Standard Specifications for Road and Bridge Construction.

Cultural Resources Commitments

- The monitoring of subsurface impacts will be conducted by a professional archaeologist at the location of site 8DA40.

Contamination Commitments

- There are currently no commitments related to contamination issues.

Air Quality Commitments

- There are currently no commitments related to air quality issues.

Sociocultural Commitments

- There are currently no commitments related to sociocultural issues.

Public Involvement Commitments

- There are currently no commitments related to public involvement issues.

1.4 Preferred Alternative

The study's Preferred Alternative includes:

Project improvements in the SR 826 southbound direction include:

- Add a GP lane from the exit to NW 103rd Street to the exit to Okeechobee Road, to provide additional capacity via roadway widening, bridge widening and shoulder width reductions.
- Modify NW 103rd Street WB to SB flyover ramp pier along the outside GP lane and widen the SR 826 mainline bridge and walls to create an additional GP lane through the NW 103rd Street interchange.
- Extend auxiliary lane between NW 74th Street and Okeechobee Road interchanges to better facilitate weaving.

- Widen bridge over NW 74th Street, Metrorail and FEC railroad to accommodate additional lane up to NW 74th Street on-ramp.
- Relocate existing ingress from North of NW 154th Street to South of NW 103rd Street to provide access from NW 154th Street and NW 122nd Street to the EL.

Project improvements in the SR 826 northbound direction include:

- Widen mainline over NW 103rd Street interchange to provide full width inside and outside shoulders.

Project improvements for the SR 826 frontage road include:

- Mill and resurface the existing pavement.
- Construct paved shoulders (5 feet wide) in segments without existing roadside landscaping or utility impacts.
- Upgrade guardrail, guardrail terminals, and guardrail-to-rigid barrier transition connections.
- Upgrade/replace sidewalk and substandard curb cut ramps
- Update all sub-standard ground-mounted signs
- Upgrade signalization including pedestrian features
- Bridge 870570 – East Frontage Road over Little River Canal/C-7 modifications including replacing bridge railings, constructing sidewalk, and replacing existing expansion joints and joint headers
- Bridge 870569 – West Frontage Road over Little River Canal/C-7 modifications including replacing bridge railings and constructing sidewalks

2.0 Existing Conditions

2.1 Existing Roadway Conditions

2.1.1 Typical Section

The current typical along the SR 826/Palmetto Expressway northbound consists of one express lane throughout the entire study limits with five general purpose lanes from NW 36th Street to Okeechobee Road and four general purpose lanes from Okeechobee Road to I-75 interchange.

The current typical along the SR 826/Palmetto Expressway southbound consists of a single express lane and three general purpose lanes from south of NW 54th Street to south of I-75 interchange; two express lanes and four general purpose lanes from south of I-75 Interchange to north of NW 103rd Street interchange; two express lanes and three general purpose lanes carried through the NW 103rd Street interchange; and, two express lanes and four general purpose lanes from south of NW 103rd Street interchange to north of NW 36th Street interchange.

The existing SR 826/Palmetto Expressway limited access right of way varies within the study limits. The right of way is generally consistent throughout the corridor ranging from 200' to 270' except at the interchanges, where it varies to accommodate entrance and exit ramps.

The typical section for SR 826 is depicted in **Figure 2-1**.

There are four existing on/off SR 826 ramps within the project limits that will be modified under this project.

Existing Ramp A, SB off-ramp at NW 74th Street, consist of a two to four-lane ramp with fully paved 10' outside shoulders and fully paved 6' inside shoulders.

Existing Ramp B, SB off-ramp at NW 103rd Street, consists of a two to four-lane ramp with fully paved 10' outside shoulders and 8' (4' paved) inside shoulders.

Existing Ramp C, SB on-ramp at NW 77th Avenue, consists of a one-lane ramp with 6' fully paved shoulders on both sides.

Existing Ramp E, NB off-ramp at NW 103rd Street, consists of a two to four-lane ramp with 8' fully paved inside shoulders and 10' fully paved outside shoulders.

The typical sections for SR 826 Ramps are depicted in **Figure 2-2** through **Figure 2-5**

Six existing frontage road typical sections are identified within the **441830-1-52-01** project limits.

Existing Roadway Typical Section 1 (Section 87260151), SR 826 East Frontage Road, W 20th Avenue from Okeechobee Road to south of W 39th Street, consists of a two-lane undivided section, with flush unpaved shoulders, and sidewalk along the right side of the roadway for most of the limits.

Existing Roadway Typical Section 2 (Section 87260151), SR 826 East Frontage Road, W 20th Avenue from south of W 39th Street to W 41st Street, consists of a two-lane undivided section, with flush paved shoulders and concrete barrier wall on the left side of the roadway adjacent to SR 826 Northbound, flush unpaved shoulder and sidewalk along the right side of the roadway.

Existing Roadway Typical Section 3 (Section 87260151), SR 826 East Frontage Road, W 20th Avenue from W 41st Street to W 44th Place, consists of a two-lane undivided section, with flush unpaved shoulders and landscaping on both sides, and sidewalk along the right side of the roadway.

Existing Roadway Typical Section 4 (Section 87260152), SR 826 West Frontage Road, NW 77th Avenue from the south project limit to south of Walmart Driveway, and from north of NW 95th Street to NW 98th Street, consists of a two-lane undivided section, with flush unpaved shoulders along both sides of the roadway and concrete barrier wall on the right side of the roadway adjacent to SR 826 Southbound.

Existing Roadway Typical Section 5 (Section 87260152), SR 826 West Frontage Road, NW 77th Avenue from south of Walmart Driveway to north of NW 95th Street, consists of a two-lane undivided section, with flush paved shoulder and concrete barrier wall on the right side of the roadway adjacent to SR 826 Southbound, and flush unpaved shoulder along the left side of the roadway.

Existing Roadway Typical Section 6 (Section 87260152), SR 826 West Frontage Road, NW 77th Avenue from NW 98th Street to NW 103rd Street, consists of a two-lane undivided one-way section with traffic in the southbound direction, with an existing drop curb and trench drain on the left side of the roadway, and a flush paved shoulder along the right side of the roadway.

Seven existing roadway typical sections and two existing bridge typical sections are identified within the **441831-1-52-01** project limits.

Existing Roadway Typical Section 1 (Section 87260298), SR 826 East Frontage Road, W 20th Avenue East from NW 103rd Street to south of Little River Canal, consists of a two-lane undivided one-way section with traffic in the northbound direction; with a flush shoulder on the left side; and curb & gutter, grass strip, and sidewalk along the right side.

Existing Roadway Typical Section 2 (Section 87260298), SR 826 East Frontage Road, W 20th Avenue East from south of Little River Canal to north of W 64th Street, consists of a two-lane undivided section, with flush unpaved shoulders on both sides, and sidewalk along the right side for most of the limits.

Existing Roadway Typical Section 3 (Section 87260298), SR 826 East Frontage Road, W 20th Avenue East from south of W 60th Street to north of W 60th Street, consists of a two-lane undivided section with a left-turn lane, with curb & gutter on both sides, and sidewalk along the right side.

Existing Roadway Typical Section 4 (Section 87260298), SR 826 East Frontage Road, W 67th Place from north of W 64th Street to NW 122nd Street/W 68th Street, consists of a two-lane divided section with auxiliary lanes in both directions, a raised median, curb & gutter along both sides, and sidewalk along the right side.

Existing Roadway Typical Section 5 (Section 87260506), SR 826 West Frontage Road, NW 77th Court from north of NW 103rd Street to south of Little River Canal, consists of a two-lane undivided section, curb & gutter along both sides, and sidewalk along the left side.

Existing Roadway Typical Section 6 (Section 87260521), SR 826 West Frontage Road, W 20th Avenue West from south of Little River Canal to NW 122nd Street/W 68th Street, consists of a two-lane undivided section, with flush unpaved shoulders along both sides, guardrail along the right side at the Peter's Pike Canal, and sidewalk along the left side for most of the limits.

Existing Roadway Typical Section 7 (Section 87260152), SR 826 West Frontage Road, W 20th Avenue West from south of W 60th Street to north of W 60th Street, consists of a two-lane undivided section with a left-turn lane, with curb & gutter and sidewalk along the left side, and paved shoulder and shoulder barrier along the right side at the Peter's Pike Canal.

Existing Bridge Typical Section 1 (Bridge 870570), SR 826 East Frontage Road, W 20th Avenue East over Little River Canal, consists of a two-lane undivided section with flush shoulders and post and beam railings on both sides; the right shoulder connects to sidewalks on the bridge approaches.

Existing Bridge Typical Section 2 (Bridge 870569), SR 826 West Frontage Road, W 20th Avenue West over Little River Canal, consists of a two-lane undivided section with wide curb and post and beam railings on both sides.

The existing right of way along the five frontage road sections is typically 50’ and varies at a few locations as follows:

- W 20 Avenue (Section 87260151) – 50’ typical
- NW 77 Avenue (Section 87260152) – 50’ typical
- W 20 Avenue East (Section 87260298) – 50’ typical, varies 46.4’-108.9’
- NW 77 Court (Section 87260506) – 50’ typical
- W 20 Avenue West (Section 87260521) – 50’ typical, maximum 100’

The typical sections for the frontage roads are depicted in **Figure 2-6** through **Figure 2-20**.

Figure 2-1 | Typical Section – SR 826

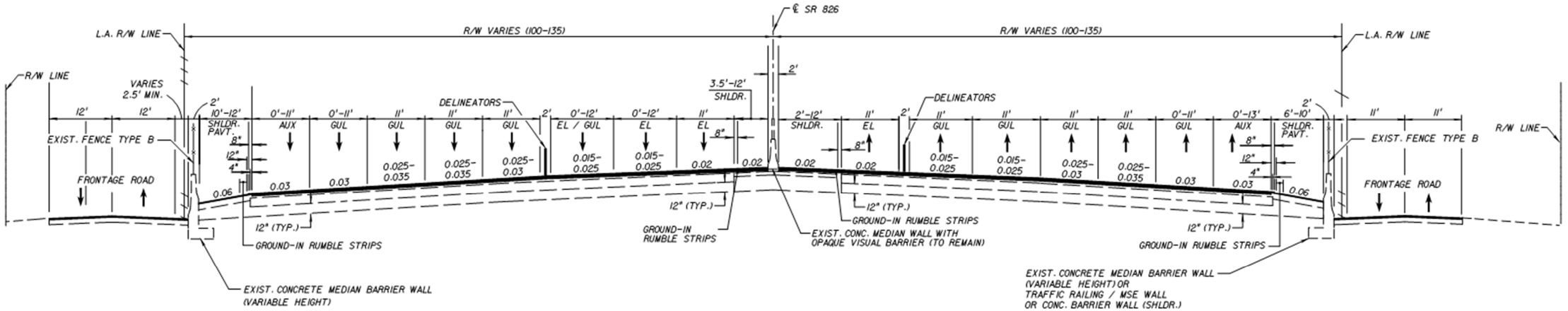


Figure 2-2 | Ramp A- SB off-ramp at NW 74th Street

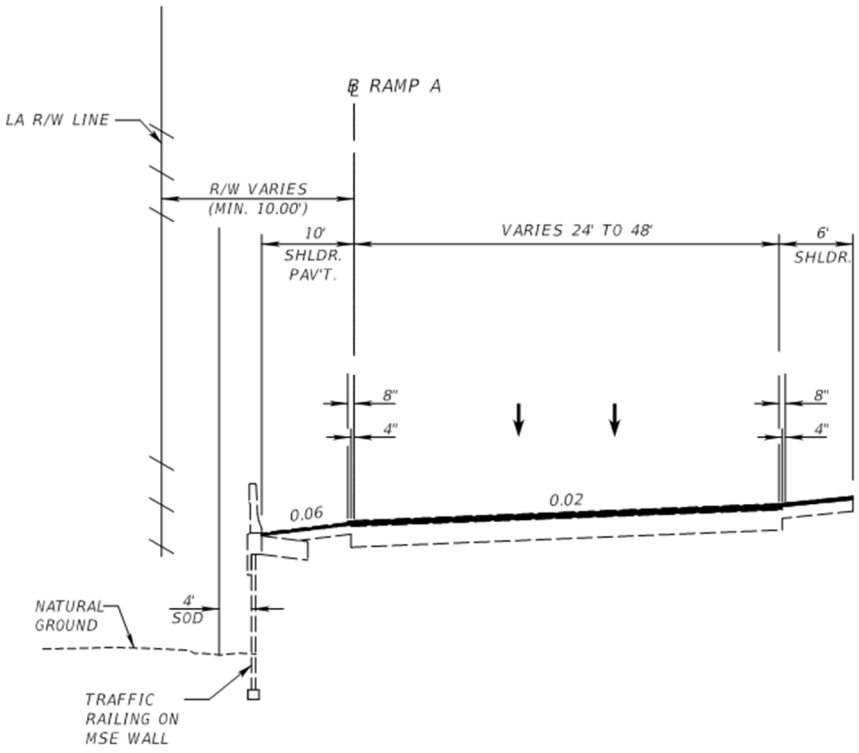


Figure 2-3 | Ramp B - SB off-ramp at NW 103rd Street

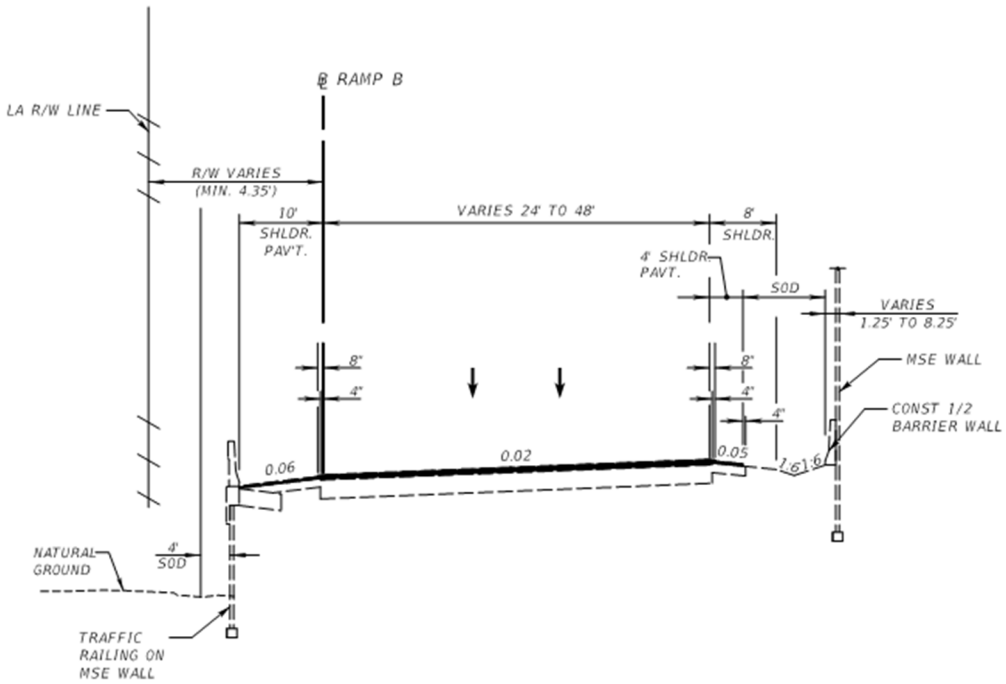


Figure 2-4 | Ramp C - SB on-ramp at NW 77th Avenue

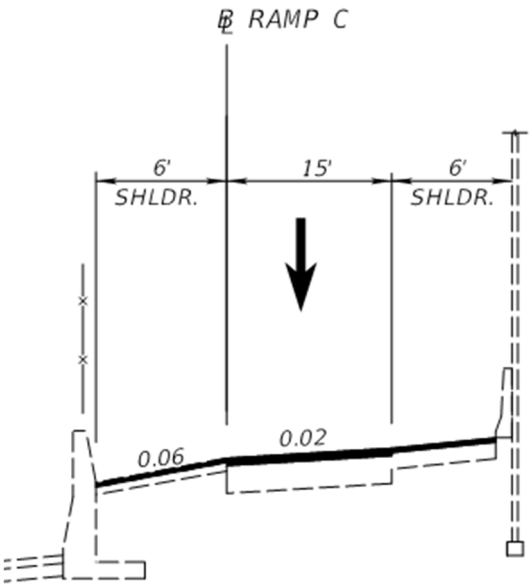


Figure 2-5 | Ramp E - NB off-ramp at NW 103rd Street

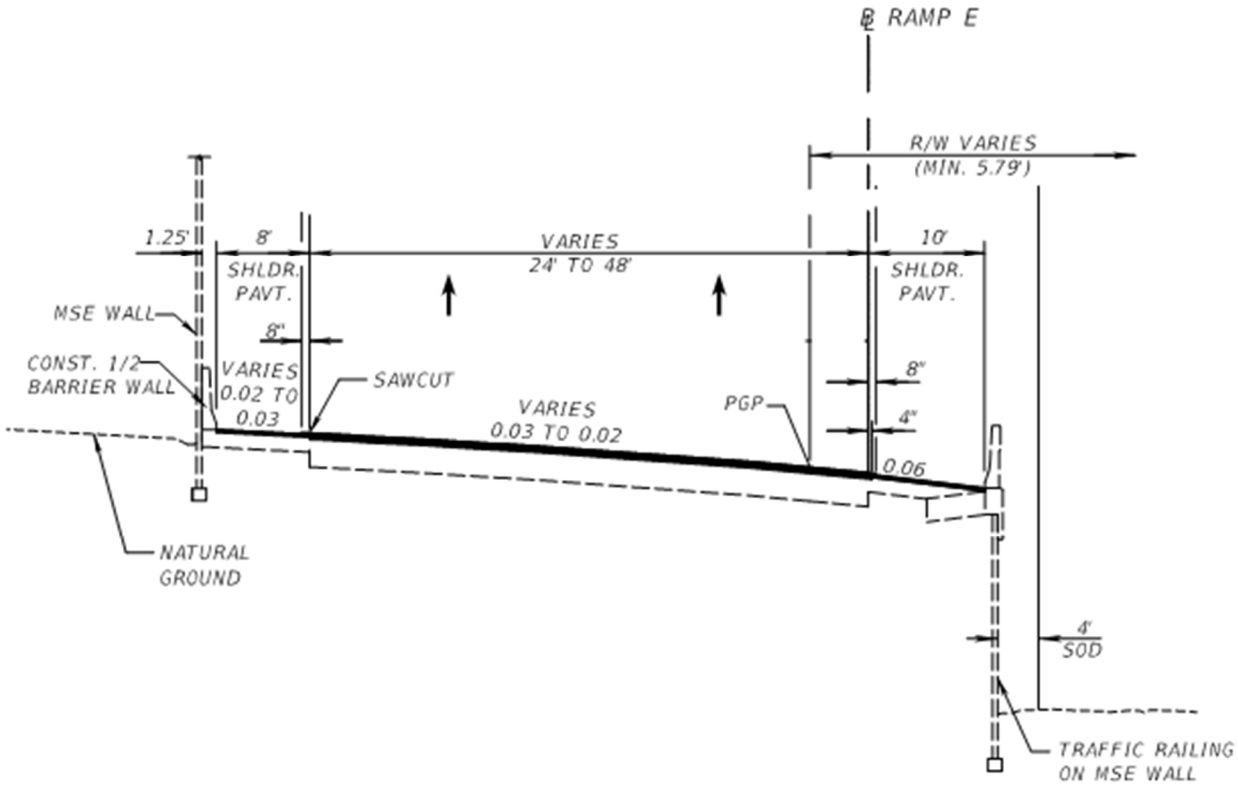


Figure 2-6 | 441830-1-52-01 SR 826 East Frontage Roads Typical Section – W 20th Avenue from Okeechobee Road to south of W 39th Street

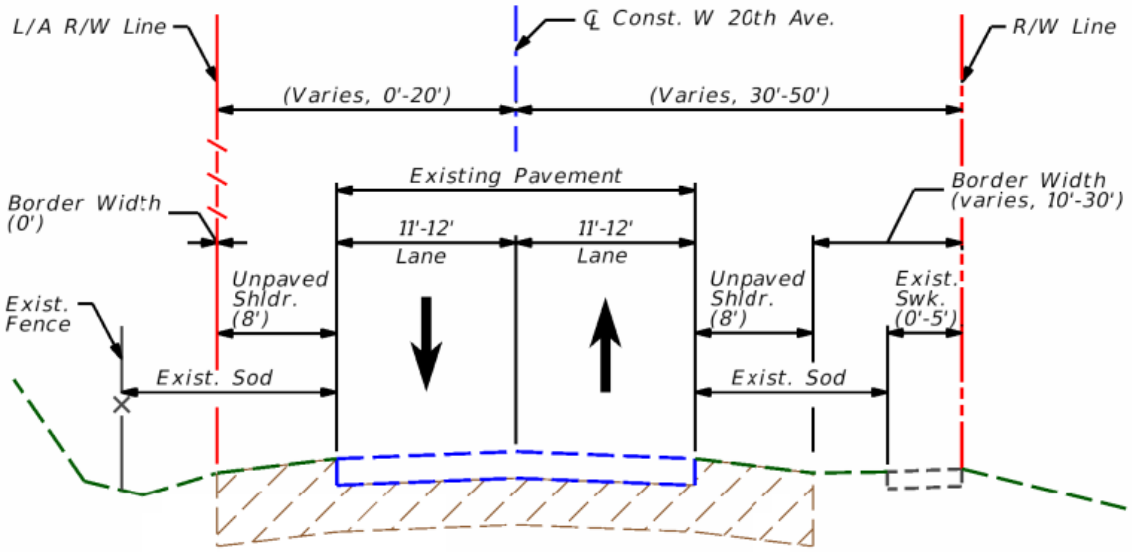


Figure 2-7 | 441830-1-52-01 SR 826 East Frontage Roads Typical Section – W 20th Avenue from W 39th Street to W 41st Street

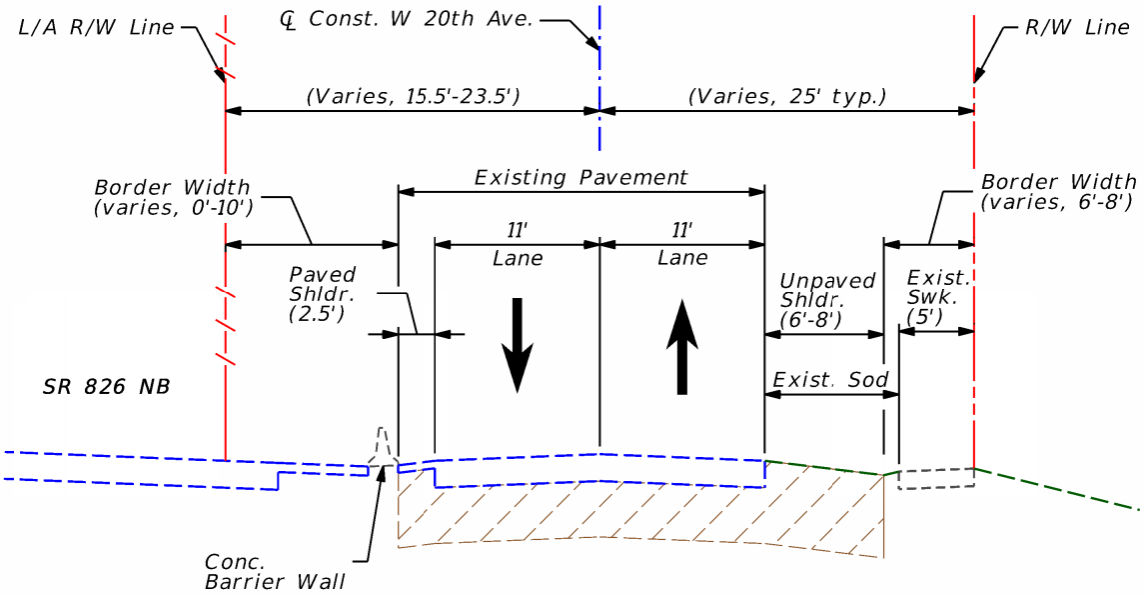


Figure 2-8 | 441830-1-52-01 SR 826 East Frontage Roads Typical Section – W 20th Avenue from W 41st Street to W 44th Place

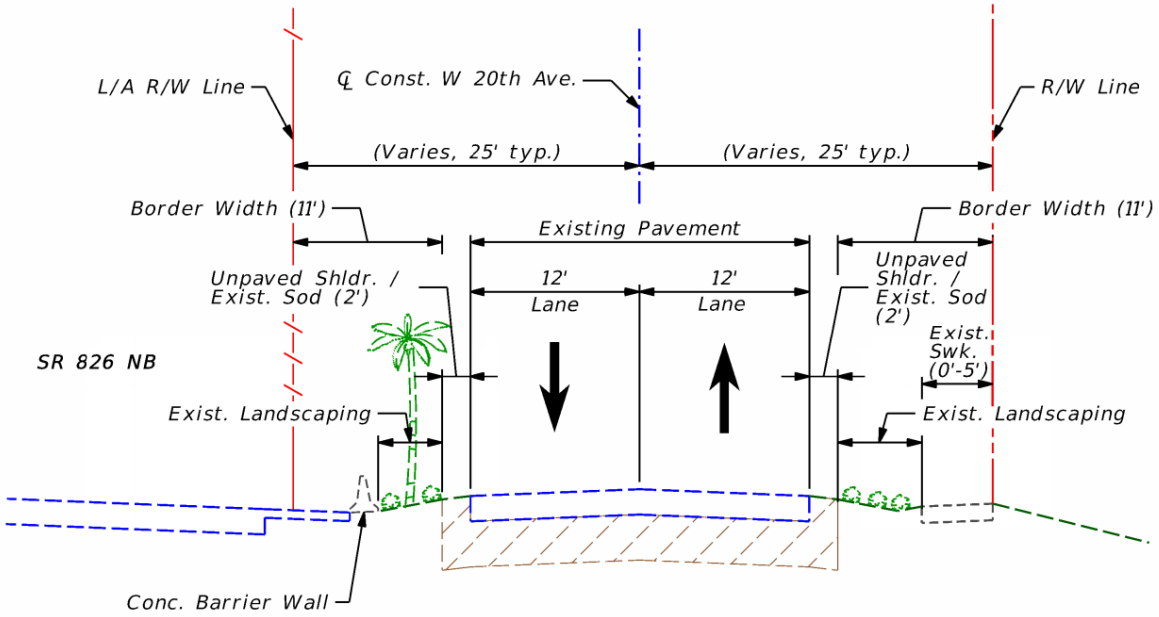


Figure 2-9 | 441830-1-52-01 SR 826 West Frontage Roads Typical Section – NW 77th Avenue from the begin project to south of the Walmart Driveway, and from north of NW 95th Street to NW 98th Street

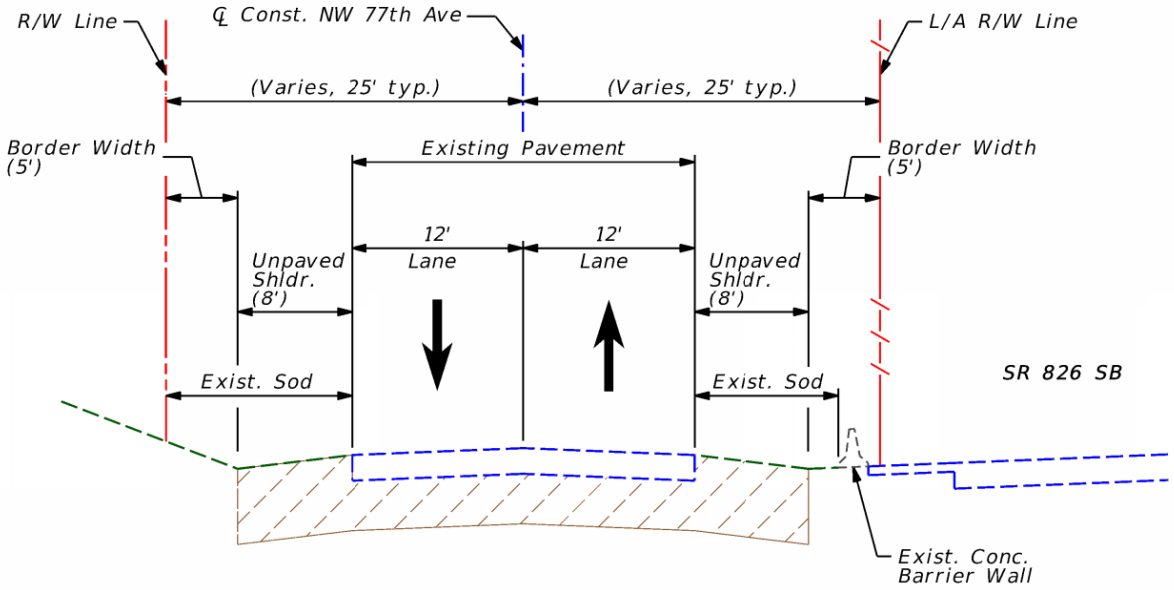


Figure 2-10 | 441830-1-52-01 SR 826 West Frontage Roads Typical Section – NW 77th Avenue from south of the Walmart Driveway to north of NW 95th Street

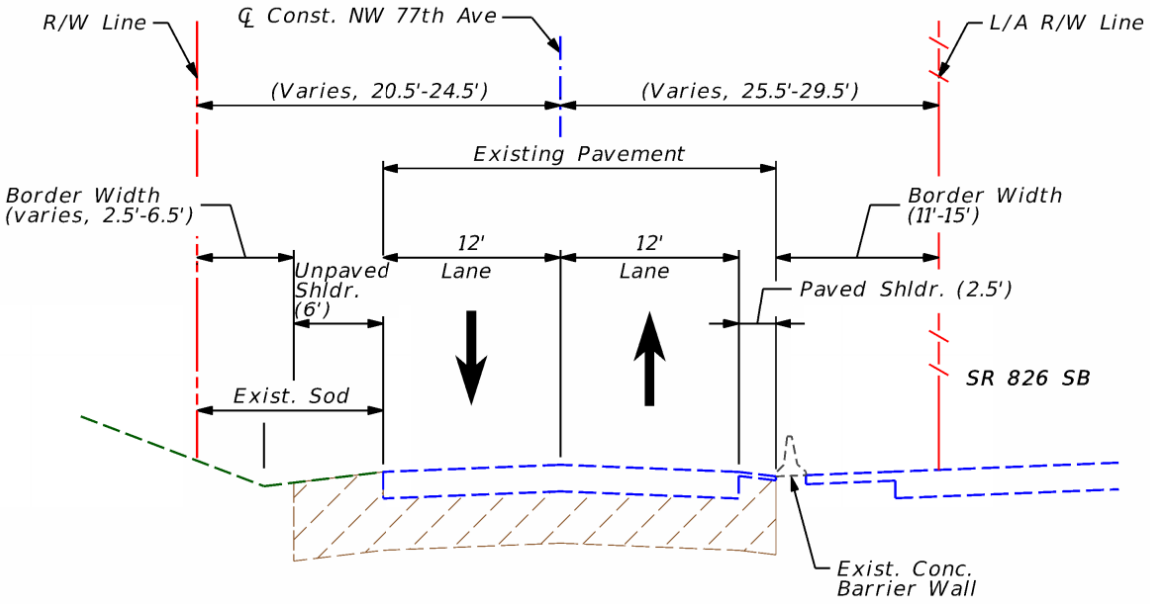


Figure 2-11 | 441830-1-52-01 SR 826 West Frontage Roads Typical Section – NW 77th Avenue from NW 98th Street to NW 103rd Street

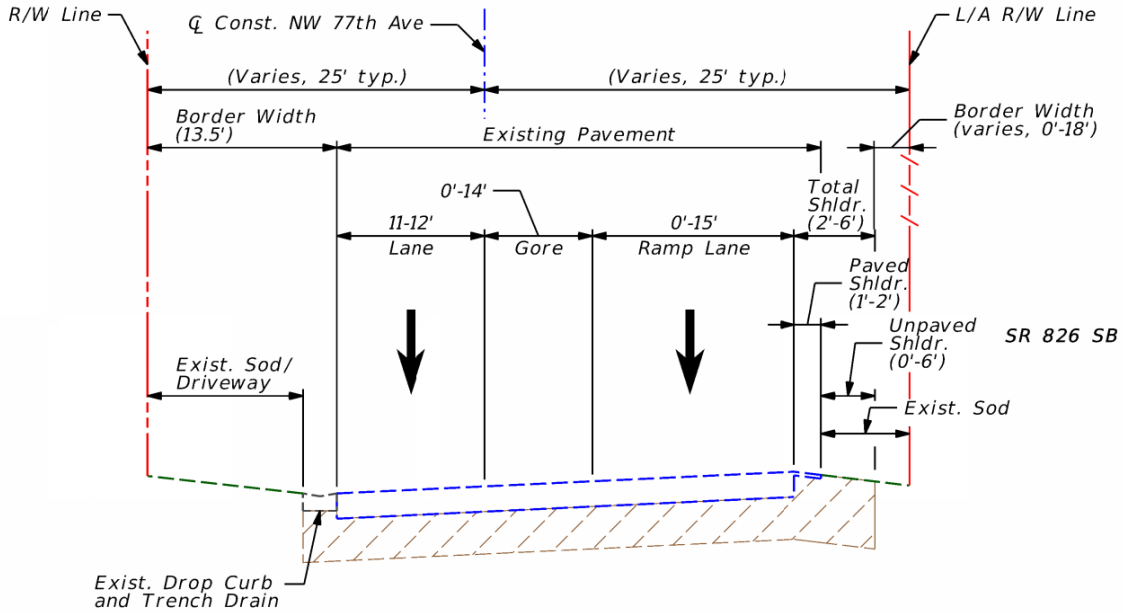


Figure 2-12 | 441831-1-52-01 SR 826 East Frontage Roads Typical Section – W 20th Avenue East from NW 103rd Street to south of the Little River Canal

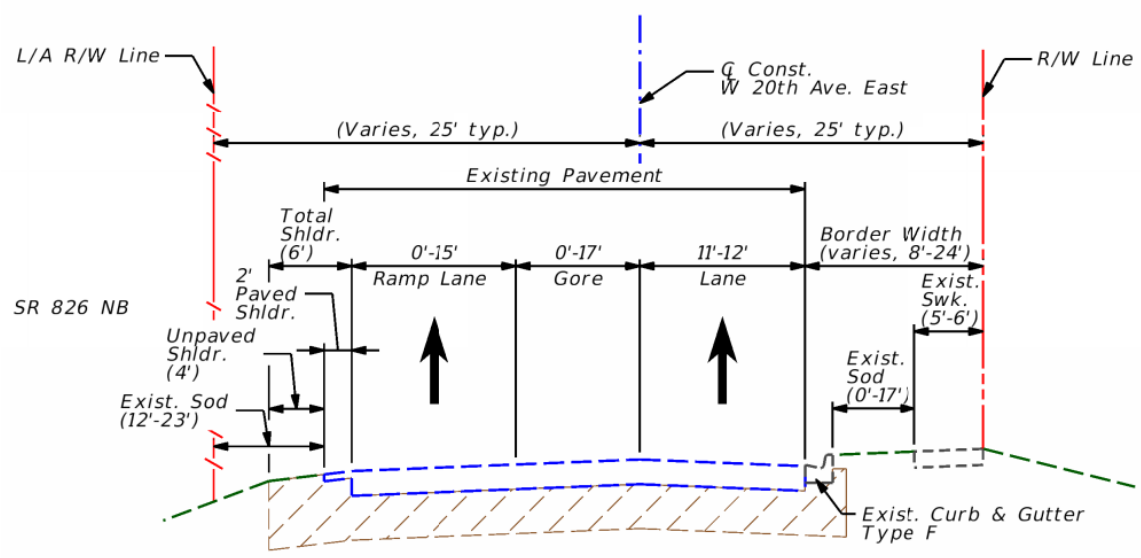


Figure 2-13 | 441831-1-52-01 SR 826 East Frontage Roads Typical Section – W 20th Avenue East from south of the Little River Canal to south of W 60th Street and from north of W 60th Street to north of W 64th Street

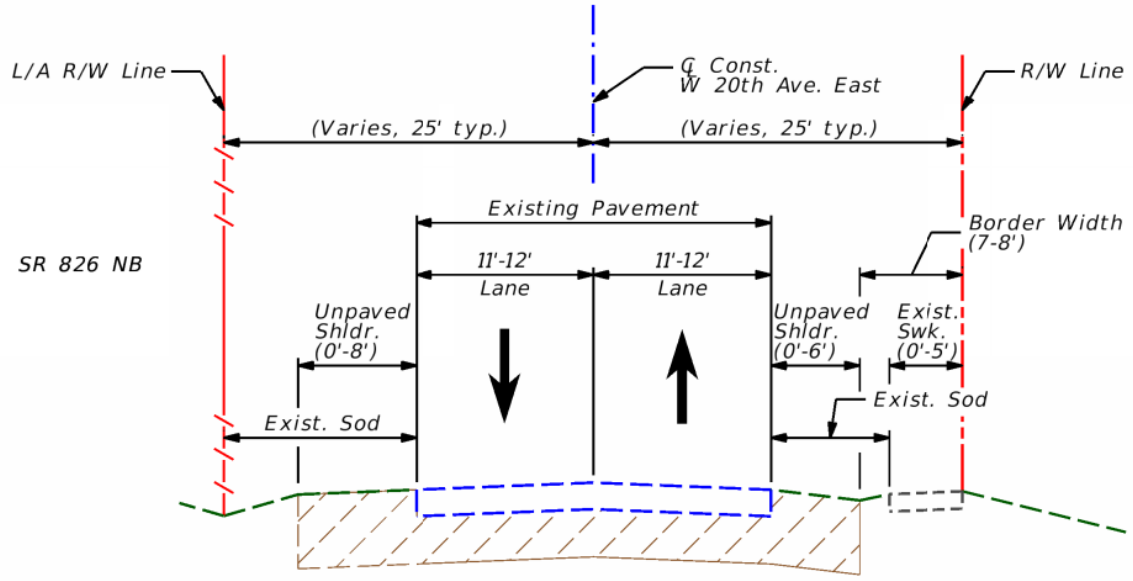


Figure 2-14 | 441831-1-52-01 SR 826 East Frontage Roads Typical Section – W 20th Avenue East from south of W 60th Street to north of W 60th Street

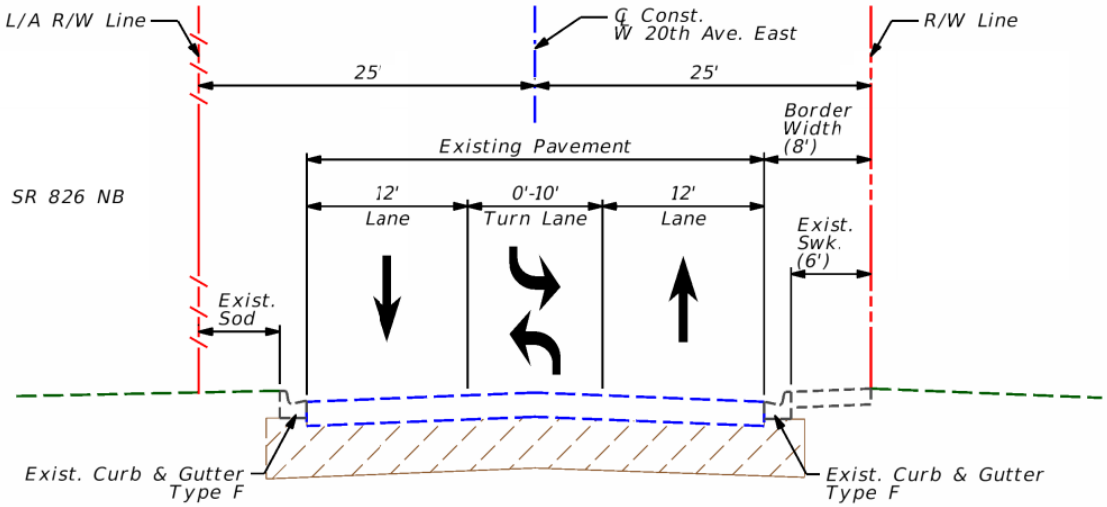


Figure 2-15 | 441831-1-52-01 SR 826 East Frontage Roads Typical Section – W 67th Place from north of W 64th Street to NW 122nd Street/W 68th Street

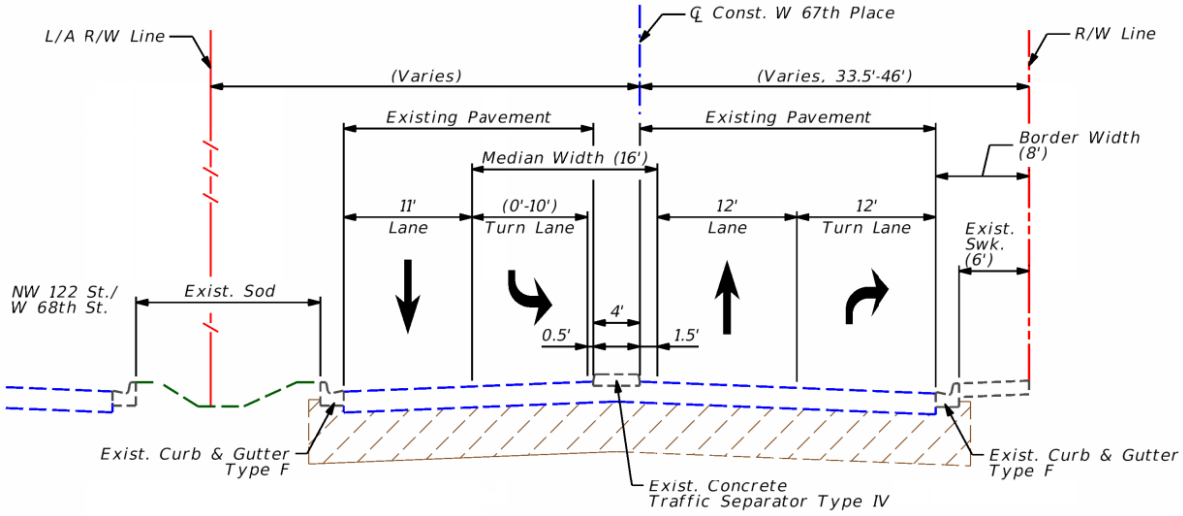


Figure 2-16| 441831-1-52-01 SR 826 West Frontage Roads Typical Section – NW 77th Court from north of NW 103rd Street to south of the Little River Canal

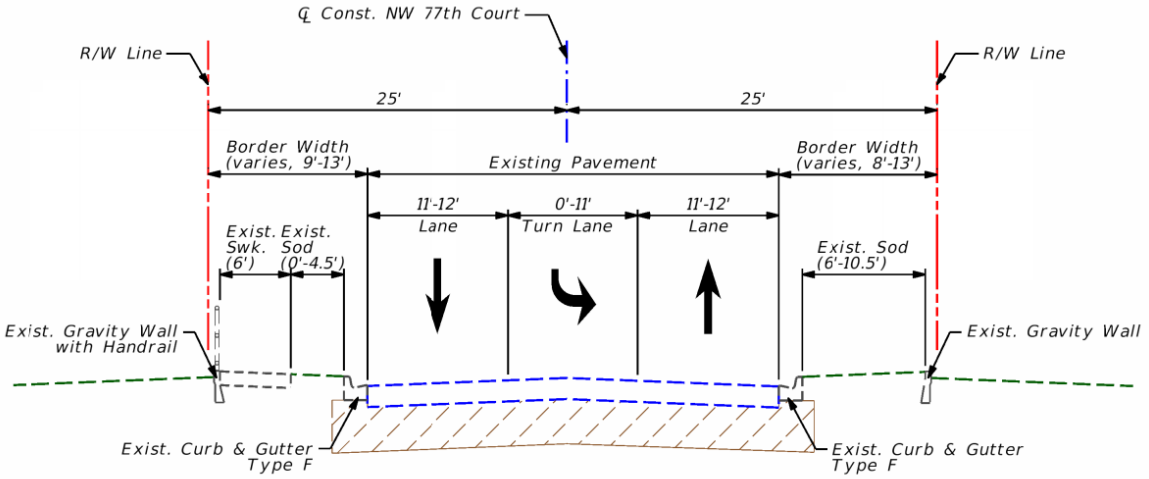


Figure 2-17| 441831-1-52-01 SR 826 West Frontage Roads Typical Section – 20th Avenue West from south of the Little River Canal to south of W 60th Street and from north of W 60th Street to NW 122nd Street/W 68th Street

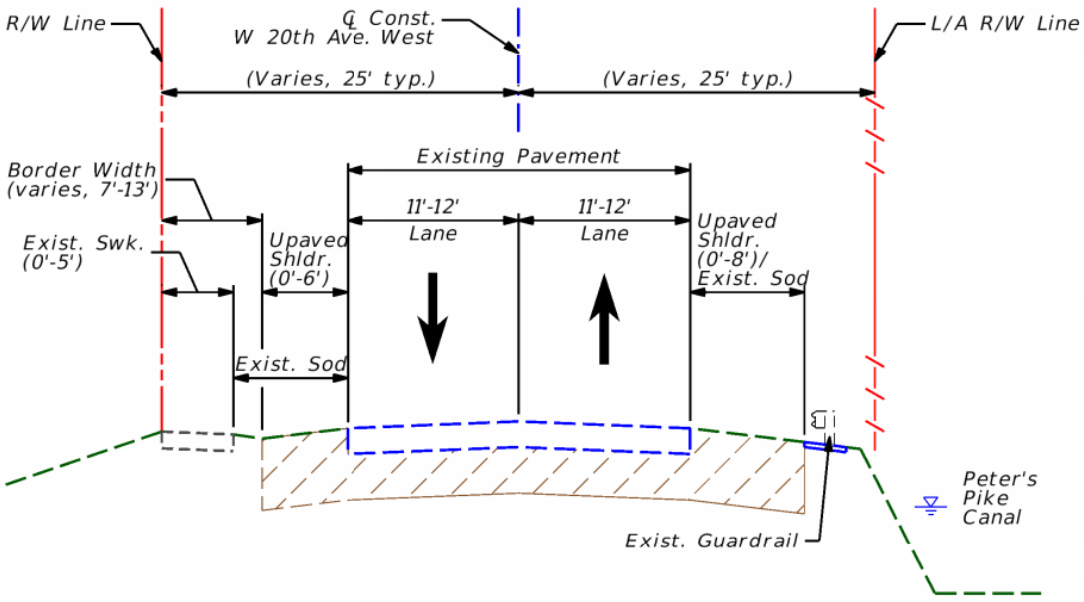


Figure 2-18 | 441831-1-52-01 SR 826 West Frontage Roads Typical Section – W 20th Avenue West from south of W 60th Street to north of W 60th Street

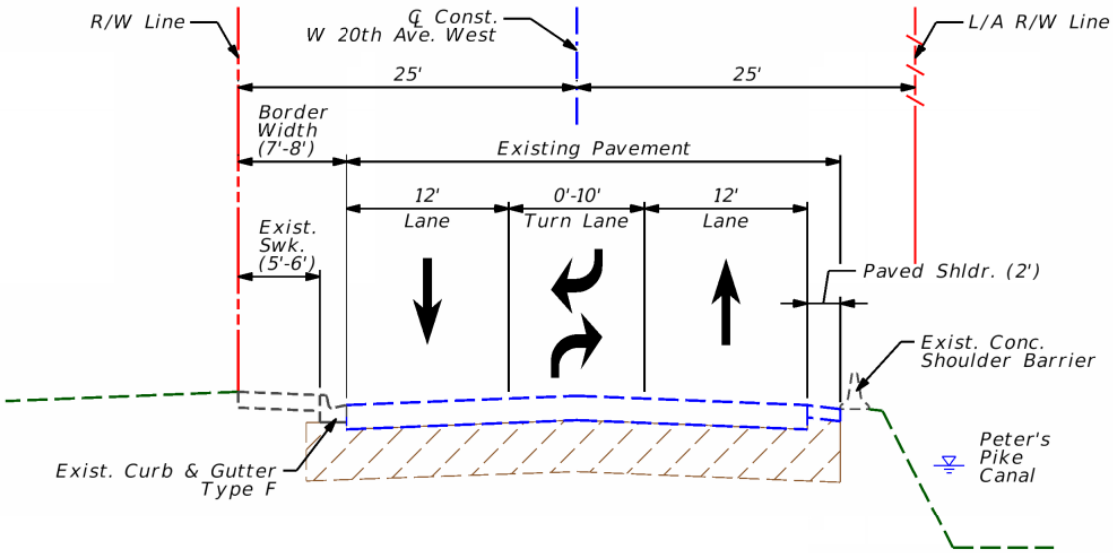


Figure 2-19 | 441831-1-52-01 SR 826 East Frontage Road Bridge Typical Section – Bridge 870570, W 20th Avenue East over the Little River Canal

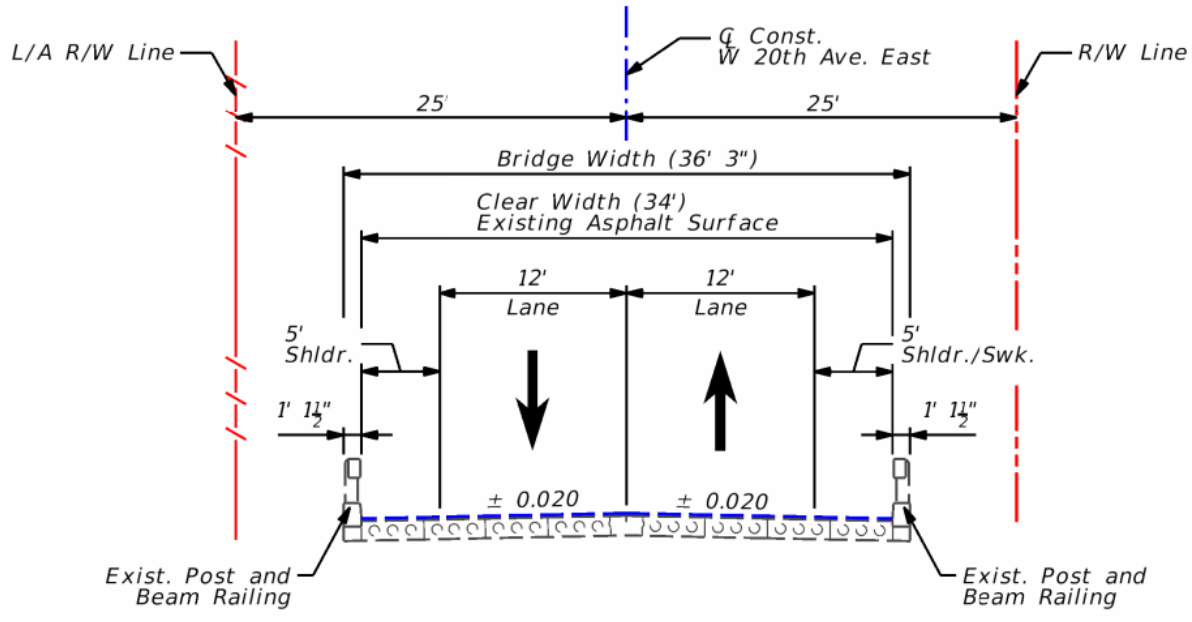
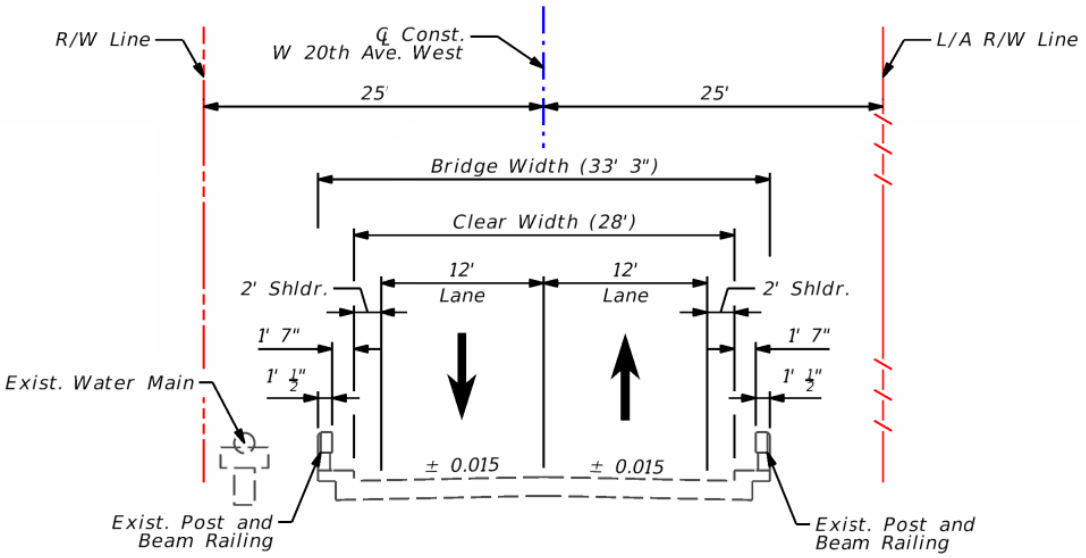


Figure 2-20 | 441831-1-52-01 SR 826 West Frontage Road Bridge Typical Section – Bridge 870569, W 20th Avenue East over the Little River Canal



2.1.2 Roadway Classification

The FDOT classifies roadways according to the nature and character of their uses. Functional Classification defines the role that a particular roadway plays in serving the flow of vehicular traffic through the network. The functional classification of SR 826 (86070000) is that of a Freeway/Expressway that serves as a major north/south mode of transportation for Miami Dade County. SR 826 is also designated as an SIS corridor, which is part of a statewide network of high priority transportation facilities that are critical to Florida's economic competitiveness.

The Access Management classification of SR 826 is Access Class 1 (Limited Access).

The functional classification of the Frontage Roads (86006000) is that of a local road that serves the commercial businesses adjacent to SR 826.

The FDOT Context Classification in combination with Transportation Characteristics of a roadway will determine key design criteria for all non-limited-access state roadways. The Context Classification system describes the general characteristics of the land use, development patterns, and roadway connectivity, providing cues as to the types of uses and user groups that will likely utilize the roadway. The Transportation Characteristics define the type of access the roadway provides, the types of trips served, and the users served. The Context Classification designation for the Frontage Roads is C3-Suburban Commercial.

2.1.3 Vertical Alignment

The vertical profile of SR 826 was obtained from the Financial Project Identification Number (FPID) 430795-1-52-0 plans. Within the limits of the study, the SR 826 profile slopes upward to a high point with an elevation of approximately 40' as it passes over NW 36th Street, and slopes downward and continues with minimal elevation changes between approximate elevations of 12' and 14', passing under NW 58th Street, north of NW 58th Street the profile slopes upward passing over NW 74th Street at an approximate elevation of 39.5'. North of 74th Street the profile continues elevated with a low point of approximately 27', and passes over NW South River Drive and Okeechobee Road with an elevation of approximately 38', the profile then slopes downward to an elevation of approximately 13' before rising again to an approximate elevation of 38 'and passing over NW 103rd Street, north of NW 103rd Street the profile slopes downward to a low point of approximately 14' in elevation, and sloping upward once more to an approximate elevation of 33.5' as it passes over NW 54th Street.

The partial vertical profiles of the west and east frontage roads were obtained from as-built plans. Within the limits of the study, the existing grades of the frontage roads vary from 0.0% minimum to approximately 2.5% maximum.

2.1.4 Horizontal Alignment

2.1.4.1 SR 826

The existing geometry of SR 826 is mostly linear between NW 36th Street and NW 154th Street. **Table 2–1** provides a summary of the existing horizontal alignment data.

Table 2-1 | Horizontal Alignment: SR 826

Curve Ref. #	Reference Station Limits	Design Speed (mph)	Curve Length (feet)	Radius	Degree
C3	PC Sta. 537+55.08 to PT Sta. 546+56.46	60	901.38	61,756.14	0°05'34"
C4	PC Sta. 608+10.72 to PT Sta. 612+21.47	60	410.76	18,000	0°19'06"

2.1.4.2 SR 826 Ramps

Summary of the existing horizontal alignment data for the SR 826 Ramps is provided in **Table 2-2** to **Table 2-5**.

Table 2-2 | Horizontal Alignment: Ramp A – SR 826 SB Off-Ramp at NW 74th Street

Curve Ref. #	Design Speed (mph)	Curve Length (feet)	Radius
C1	40	53.95	50
C2	55	87.92	220

Table 2-3 | Horizontal Alignment: Ramp B – SR 826 SB Off-Ramp at NW 103rd Street

Curve Ref. #	Design Speed (mph)	Curve Length (feet)	Radius	Degree
C1	40	484.45	5754	00°59'45"
C2	40	518.26	5642.57	01°00'56"

Table 2-4 | Horizontal Alignment: Ramp C – SR 826 SB On-Ramp at NW 77th Avenue

Curve Ref. #	Design Speed (mph)	Curve Length (feet)	Radius	Degree
C1	60	400.05	5834	00°58'56"
C2	40	379.41	5730	01°00'00"

Table 2-5 | Horizontal Alignment: Ramp E – SR 826 NB Off-Ramp at NW 103rd Street

Curve Ref. #	Design Speed (mph)	Curve Length (feet)	Radius	Degree
C1	55	400.05	9,822.14	00°35'00"

2.1.4.3 SR 826 Frontage Roads

2.1.4.3.1 441830-1-52-01 project limits

Seven horizontal curves are located within the project limits. The curve data is summarized in **Table 2-6**, based on the plans from the previous projects and the design survey. The existing horizontal curves C1, C2, C4 and C6 are sub-standard with criteria for minimum radius. All existing horizontal curves are sub-standard with criteria for minimum curve length.

Table 2-6 | Horizontal Alignment: SR 826 Frontage Roads 441830-1-52-01 project limits

Curve Ref. #	Original Construction Project	Reference Station Limits	Design Speed (mph)	Curve Length (feet)	Radius	Degree	Super Elevation Rate	
							Existing	Required (e_{max}=0.05)
East Frontage Road/W 20th Avenue (section 87260151)								
C1	State Project 87260-3501	PC Sta. 200+26.67 to PT Sta. 201+39.17	15	112.50	72.00	79°34'39"	NC	0.044
C2	State Project 87260-3501	PC Sta. 202+88.51 to PT Sta. 203+56.51	15	68.00	80.00	71°37'11"	RC	0.042
C3	State Project 87260-3529	PC Sta. 208+57.66 to PT Sta. 210+84.92	30	227.26	290.00	19°45'26"	0.087	0.050
C4	State Project 87260-3529	PC Sta. 213+62.45 to PCC Sta. 215+43.84	30	181.39	250.00	22°55'06"	0.089	0.050
C5	FPID 432687-1-52-01	PCC Sta. 215+43.84 to PT Sta. 216+00.00	30	56.16	974.95	5°52'36"	0.064	NC
West Frontage Road/NW 77th Avenue (section 87260152)								
C6	FPID 249653-1-52-01	PC Sta. 700+30.87 to PT Sta. 701+43.48	20	112.60	175.00	32°44'26"	0.082	0.042
C7	FPID 432687-1-52-01	PC Sta. 706+52.17 to PT Sta. 707+58.81	30	106.64	1,528.36	03°44'56"	NC	NC

2.1.4.3.2 441831-1-52-01 project limits

Twelve existing horizontal curves are located within the project limits. The curve data is summarized in Error! Reference source not found. **2-7**, based on the plans from the previous projects and the design survey. The existing horizontal curves C6, C7, C8, and C12 are sub-standard with criteria for minimum radius. All existing horizontal curves, except C3, are sub-standard with criteria for minimum curve length.

Table 2-7 | Horizontal Alignment: SR 826 Frontage Roads 441831-1-52-01 project limits

Curve Ref. #	Original Construction Project	Reference Station Limits	Design Speed (mph)	Curve Length (feet)	Radius	Degree	Super Elevation Rate	
							Existing	Required (e_{max}=0.05)
East Frontage Road/W 20th Avenue East (section 87260298)								
C1	FPID 249113-1-52-01	PC Sta. 301+34.70 to PT Sta. 303+24.65	30	189.95	3,340.00	1°42'56"	NC	NC
C2	FPID 249113-1-52-01	PC Sta. 307+34.73 to PT Sta. 308+46.31	30	111.59	2,520.00	2°16'25"	NC	NC
C3	State Project 87260-3573	PC Sta. 353+00.58 to PT Sta. 357+39.20	30	438.62	430.00	13°19'29"	0.070	RC
C4	State Project 87260-3536	PC Sta. 360+14.80 to PT Sta. 362+29.30	20	214.50	275.00	20°50'05"	0.050	0.036
C5	State Project 87260-3536	PC Sta. 363+39+62 to PT Sta. 365+45.07	20	205.45	150.00	38°11'50"	0.070	0.044
C6	N/A	PC Sta. 372+09.16 to PT Sta. 373+28.45.00	15	119.29	76.00	75°23'21"	NC	N/A
West Frontage Road/NW 77th Avenue (section 87260152)								
C7	FPID 249113-1-52-01	PC Sta. 406+17+76 to PT Sta. 407+42.31	20	124.55	100.00	57°17'45"	NC	0.049
C8	FPID 249113-1-52-01	PC Sta. 408+93.36 to PT Sta. 409+68.42	15	75.06	47.00	121°54'21"	NC	N/A
West Frontage Road/W 20th Avenue West (section 87260521)								
C9	State Project 87260-3534	PC Sta. 450+69.64 to PT Sta. 453+54.36	35	284.73	1,885.00	3°02'22"	NC	NC
C10	State Project 87260-3534	PC Sta. 455+68.30 to PT Sta. 458+78.52	35	310.23	2,115.00	2°42'32"	NC	NC
C11	State Project 87260-3534	PC Sta. 462+12.54 to PT Sta. 464+41.60	20	229.06	150.00	38°11'50"	0.100	0.044
C12	State Project 87260-3534	PC Sta. 469+85.61 to PT Sta. 471+00.48	15	114.87	75.00	76°23'40"	NC	N/A

2.1.5 Frontage Roads Existing Deficiencies

2.1.5.1 Lane Widths

2.1.5.1.1 441830-1-52-01 project limits

The existing lane widths were reviewed based on the plans of the previous projects and the design survey. The existing travel lane widths are typically 12 feet, except in the following segments.

- W 20th Avenue, 11 feet wide lanes in the two-way segment from south of W 39th Street to W 41st Street
- NW 77th Avenue, 11 feet wide through lane and 15 feet wide on-ramp lane in the one-way segment from NW 99th Street to NW 103rd Street

2.1.5.1.2 441831-1-52-01 project limits

The existing lane widths were reviewed from the plans of the previous projects and the design survey. The existing travel lane widths are typically 11-12 feet. The existing turn lane widths are typically 10-11 feet.

2.1.5.2 Shoulder Widths

2.1.5.2.1 441830-1-52-01 project limits

Flush shoulders are located throughout the project limits. A review of the plans from the previous resurfacing projects indicates the existing shoulder width vary as follows:

- East Frontage Road/W 20th Avenue (Section 87260151)
  - Typical Section 1 – From Okeechobee Road to south of W 39th Street
    - Full-width shoulder = 8 feet typical (LT and RT)
    - No paved shoulders
  - Typical Section 2 – From south of W 39th Street to W 41st Street
    - Full-width shoulder = minimum 2.5 feet LT at the SR 826 barrier wall and varies 6-8 feet RT
    - Paved shoulder width = minimum 2.5 feet LT and no paved shoulder RT
  - Typical Section 3 – From W 41st Street to W 44th Place
    - Full-width shoulder = ±2 feet typical (LT and RT) at landscaping areas
    - No paved shoulders
- West Frontage Road/NW 77th Avenue (Section 87260152)
  - Typical Section 4 – From south project limit to south of Walmart Driveway and from north of NW 95th Street to NW 98th Street
    - Full-width shoulder = 8 feet typical (LT and RT)
    - No paved shoulders

- Typical Section 5 – From south of Walmart Driveway to north of NW 95th Street
  - Full-width shoulder = minimum 2.5 feet RT at the SR 826 barrier wall and 6 feet typical LT
  - Paved shoulder width = minimum 2.5 feet RT and no paved shoulder LT
- Typical Section 6 – From NW 98th Street to NW 103rd Street
  - Full-width shoulder = 2-6 feet RT
  - Paved shoulder width = 1-2 feet RT
  - No LT shoulder at existing drop curb and trench drain

2.1.5.2.2 441831-1-52-01 project limits

Flush shoulders are located throughout most of the project limits. A review of the plans from the previous resurfacing projects indicates the existing shoulder width vary as follows:

- East Frontage Road/W 20th Avenue East (section 87260298)
  - Roadway Typical Section 1 – From NW 103rd Street to south of Little River Canal
    - Full-width shoulder = 6 feet LT
    - Paved shoulder width = 2 feet LT
  - Roadway Typical Section 2 – From south of Little River Canal to north of W 64th Street, Exceptions are Little River Canal Bridge and from south of W 60th Street to north of W 60th Street
    - Full-width shoulder = 8 feet LT and 6 feet RT
    - No paved shoulders
  - Roadway Typical Section 3 – From south of W 60th Street to north of W 60th Street
    - No shoulders at curb & gutter segment
  - Roadway Typical Section 4 – W 67th Place, from north of W 64th Street to NW 122nd Street/W 68th Street
    - No shoulders at curb & gutter segment
  - Bridge Typical Section 1 – W 20th Avenue East over Little River Canal
    - 5 feet shoulders (LT & RT)
- West Frontage Road/NW 77th Court (section 87260506), Roadway Typical Section 5, From north of NW 103rd Street to south of Little River Canal
  - No shoulders at curb & gutter segment
- West Frontage Road/W 20th Avenue West (section 87260521)
  - Roadway Typical Section 6, From south of Little River Canal to NW 122nd Street/ W 68th Street, Exceptions are Little River Canal Bridge and from south of W 60th Street to north of W 60th Street

- Full-width shoulder = 6 feet LT and 8 feet RT
- No paved shoulders

- Roadway Typical Section 7, From south of W 60th Street to north of W 60th Street
  - Paved shoulder width = 2 feet RT at barrier wall
  - No LT shoulder at curb & gutter segment
- Bridge Typical Section 2 – W 20th Avenue West over Little River Canal
  - 2 feet shoulders (LT & RT)

2.1.5.3 Pedestrian and bicyclists

2.1.5.3.1 441830-1-52-01 project limits

The existing sidewalk widths (5 feet typical) meet RRR criteria per FDM Table 222.1.1. The following sub-standard conditions were identified:

- Damaged and Uneven Sidewalk at multiple segments
- Unobstructed Sidewalk Width – The existing unobstructed sidewalk width at several utility poles is sub-standard (less than 32 inches) along the East Frontage Road/W 20th Avenue
  - Two utility poles north of W 35th Street
  - One utility pole north of the Best Buy driveway
  - One utility pole north of Southern Winds Hospital (First Driveway)
  - One utility pole north of Florida National College (Second Driveway)

The existing pedestrian ramps were evaluated for compliance with the FDOT Standard Plans for Road Construction and ADA Standards.

- Pedestrian ramps are not provided at several locations.
- The existing ramp slopes were field verified with a smart level and some existing pedestrian ramps do not meet current FDOT requirements for ramp slope, landing width or cross slope, or transition slope.
- Most existing pedestrian ramps within the project limits have no detectable warning surface or have a sub-standard concrete tactile surface.

No existing designated bicycle facilities are present within the project limits. The existing shoulders are unpaved throughout most of the project limits.

2.1.5.3.2 441831-1-52-01 project limits

The existing sidewalk widths (5-6 feet) meet RRR criteria per FDM Table 222.1.1. The following sub-standard conditions were identified:

- Damaged and Uneven Sidewalk at multiple segments

- Unobstructed Sidewalk Width – The existing unobstructed sidewalk width at one existing utility pole is sub-standard (less than 32 inches) along the West Frontage Road/W 20th Avenue south of W 64th Street
- Unobstructed Sidewalk Width – The existing unobstructed sidewalk width is sub-standard (less than 48 inches) at the following locations:
    - Two mast arm signal poles at W 20th Ave. East and W 60th St. (SE and NE corners)
    - One mast arm signal pole at W 20th Ave. West and W 60th St. (SW corner)
    - One light pole along W 20th Ave. East north of NW 103rd St.
    - Two light poles along NW 77th Ct. north of NW 103rd St.
    - One newspaper bin (El Clarin) at W 20th Ave. West, north of W 52nd St.

The existing pedestrian ramps were evaluated for compliance with the FDOT Standard Plans for Road Construction and ADA Standards.

- Pedestrian ramps are not provided at several locations.
- The existing ramp slopes were field verified with a smart level and some existing pedestrian ramps do not meet current FDOT requirements for ramp slope, landing width, cross slope, or transition slope.
- Most existing pedestrian ramps within the project limits have no detectable warning surface or have a sub-standard concrete tactile surface.

Two signalized intersections are located within the project limits:

- East Frontage Road/W 20th Avenue East at W 60th Street (Asset 5914)
- West Frontage Road/W 20th Avenue West at W 60th Street (Asset 5913)

No existing designated bicycle facilities are present within the project limits. The existing shoulders are unpaved throughout most of the project limits.

2.1.5.4 Sidewalks

2.1.5.4.1 441830-1-52-01 project limits

No existing sidewalks are present along the West Frontage Road/NW 77th Avenue (section 87260152). Existing sidewalk is located along the East Frontage Road/W 20th Avenue (section 87260151) along the right side of the roadway in three discontinuous segments covering most of the limits:

- From W 35th Street (sta. 202+01) to the second driveway at Westland Promenade (sta. 209+89)
- From W 39th Street (sta. 217+03) to the driveway at Citrus Health Center (sta. 226+06)
- From the driveway at Southern Winds Hospital (sta. 228+15) to W 44th Place (sta. 236+82)

2.1.5.4.2 441831-1-52-01 project limits

Existing sidewalk is located along the Frontage Roads throughout most of the project limits in the following discontinuous segments:

- East Frontage Road/W 20th Avenue East (section 87260298)
  - Existing sidewalk along the RT side from NW 103rd Street (sta. 300+63) to W 64th Street (sta. 354+36)
  - Existing sidewalk along the RT side from a point north of W 64th Street (sta. 357+42) to the end of the segment at NW 122nd Street/W 68th Street (sta. 373+34).
- West Frontage Road/NW 77th Court (section 87260506)
  - Existing sidewalk along the LT side from NW 103rd Street (sta. 400+91) to the end of the segment south of the Little River Canal (sta. 409+23).
- West Frontage Road/W 20th Avenue West (section 87260521)
  - Existing sidewalk along the LT side from W 52nd Street (sta. 413+19) to W 62nd Street (sta. 445+98).
  - Existing sidewalk along the LT side from a point south of W 64th Street (sta. 450+26) to a point north of W 64th Street (sta. 455+22).
  - Existing sidewalk along the LT side of W 67th Place, from a point east of W 21st Avenue (sta. 466+98) to the end of the segment at NW 122nd Street/W 68th Street (sta. 471+35).

2.2 Existing ITS Conditions

The existing ITS devices within the study limits on SR 826 are currently operated, monitored, and managed from the FDOT District Six SunGuide Transportation Management Center (TMC) using the SunGuide software to control and monitor the existing ITS devices. The following is a description of all the existing ITS devices within the study area and the potential impacts on them for the proposed improvements as part of the Preferred Alternative.

2.2.1 ITS Devices

Pan-Tilt-Zoom (PTZ) CCTV cameras: Within the study limits, the District Six TMC operates six (6) CCTV cameras along SR 826. It is anticipated that each of these camera locations would be affected by the Preferred Alternative and will require relocation or replacement.

Microwave Vehicle Detection System (MVDS): Within the study limits, the District Six TMC operates forty-seven (47) MVDS along SR 826. Most of these devices will remain and be calibrated, however twelve (12) will require replacement.

Dynamic Messaging Signs (DMS): Within the study limits, the District Six TMC operates fifteen (15) DMS used for the freeway operations, seven (7) lane status DMS and eight (8) toll amount DMS. All of these devices will be removed and replaced.

Wireless Access Points (WAP): Within the study limits, the District Six TMC operates two (2) WAPs along SR 826. Both of these WAP locations would be affected by the Preferred Alternative and most likely require relocation.

Ramp Signaling System (RSS): Within the study limits, the District Six TMC operates two (2) RSS sites along SR 826, both at the interchange with 103rd St. The RSS consists of several components which include loop detectors, (ramp queue loop, demand loop, and passage loop), flashing beacons, ramp signal heads, and ramp signal cabinets (RSC). The RSS will be impacted by the Preferred Alternative and require replacement.

Table 2-8 | Existing ITS Devices

DEVICE TYPE	PLAN ID	SUNGUIDE ID	STATION	NOTES
CCTV	CCTV 826-21-TADMS	1624-826EL008.84-VCCTV	302+24	TO BE REMOVED
CCTV	CCTV 826-55-RSS	1663-826RS013.18-VCCTV2	529+97	TO BE REMOVED
CCTV	CCTV 826-53-EX	1661-826EL013.2-CCTV	531+27	TO BE REMOVED
CCTV	CCTV 826-56-RSS	1664-826RS013.2-VCCTV	531+27	TO BE REMOVED
CCTV	CCTV 826-57-EX	1665-826EL013.33-CCTV-CCTV	535+01	TO BE REMOVED
CCTV	CCTV 826-58-RSS	1666-826RS013.33-VCCTV	535+01	TO BE REMOVED
DMS	LSDMS 826-07-EX	DMS-826ELNB011.68-LS	451+00	TO BE REMOVED
DMS	TADMS 826-13-EX	DMS-826ELNB011.92-TA1	467+59	TO BE REMOVED
DMS	TADMS 826-14-EX	DMS-826ELNB011.92-TA2	467+59	TO BE REMOVED
DMS	LSDMS 826-08-EX	DMS-826ELNB012.14-LS	478+00	TO BE REMOVED
DMS	LSDMS 826-06-EX	DMS-826ELNB009.61-LS	488+85	TO BE REMOVED
DMS	DMS 826-06-SB	DMS-826SB013.74	563+76	TO BE REMOVED
DMS	LSDMS 826-11-EX	DMS-826ELSB016.27-LS	693+61	TO BE REMOVED
DMS	TADMS 826-19-EX	DMS-826ELSB016.41-TA1	701+61	TO BE REMOVED
DMS	TADMS 826-20-EX	DMS-826ELSB016.41-TA2	701+61	TO BE REMOVED
DMS	TADMS 826-21-EX	DMS-826ELSB016.41-TA3	701+61	TO BE REMOVED
DMS	LSDMS 826-11A-EX	DMS-826ELSB016.76-LS	717+98	TO BE REMOVED
DMS	TADMS 826-22-EX	DMS-826ELSB016.96-TA1	728+34	TO BE REMOVED
DMS	TADMS 826-23-EX	DMS-826ELSB016.96-TA2	728+34	TO BE REMOVED
DMS	TADMS 826-24-EX	DMS-826ELSB016.96-TA3	728+34	TO BE REMOVED
DMS	LSDMS 826-12-EX	DMS-826ELSB017.20-LS	742+51	TO BE REMOVED
MVDS	MVDS 826-56-SB	DS-826SB011.41	437+66	TO BE CALIBRATED
MVDS	MVDS 826-57-EX	DS-826ELNS011.41	437+66	TO BE CALIBRATED
MVDS	MVDS 826-58-NB	DS-826NB011.68	451+00	TO BE REMOVED

MVDS	MVDS 826-60-EX	DS-826ELNB011.68	451+00	TO BE REMOVED
MVDS	MVDS 826-59-SB	DS-826SB011.68	451+00	TO BE REMOVED
MVDS	MVDS 826-61-EX	DS-826ELSB011.68	451+00	TO BE REMOVED
MVDS	MVDS 826-65-EX	DS-826ELSB011.92	467+59	TO BE CALIBRATED
MVDS	MVDS 826-63-SB	DS-826SB011.92	467+59	TO BE CALIBRATED
MVDS	MVDS 826-65B-SB	DS-826SB012.04	473+95	TO BE CALIBRATED
MVDS	MVDS 826-63A-SB	DS-826SB012.23	485+44	TO BE CALIBRATED
MVDS	MVDS 826-64A-EX	DS-826ELNS012.23	485+44	TO BE CALIBRATED
MVDS	MVDS 826-63B-SB	DS-826SB012.45	497+19	TO BE CALIBRATED
MVDS	MVDS 826-66-SB	DS-826SB012.67	505+49	TO BE CALIBRATED
MVDS	MVDS 826-67-EX	DS-826ELNS012.67	505+49	TO BE CALIBRATED
MVDS	MVDS 826-67A-SB	DS-826SB012.72	508+50	TO BE CALIBRATED
MVDS	MVDS 826-68-NB	DS-826NB013.00	522+00	TO BE REMOVED
MVDS	MVDS 826-69-SB	DS-826SB013.00	522+00	TO BE REMOVED
MVDS	MVDS 826-70-EX	DS-826ELNS013.00	522+00	TO BE REMOVED
MVDS	MVDS 826-71A-SB	DS-826SB013.20	531+27	TO BE REMOVED
MVDS	MVDS 826-71B-NB	DS-826NB013.33	535+01	TO BE REMOVED
MVDS	MVDS 826-71-SB	DS-826SB013.34-A	539+08	TO BE CALIBRATED
MVDS	MVDS 826-72-SB	DS-826SB013.34-B	539+08	TO BE CALIBRATED
MVDS	MVDS 826-73-EX	DS-826ELSB013.34	539+08	TO BE CALIBRATED
MVDS	MVDS 826-75-SB	DS-826SB013.70	558+06	TO BE CALIBRATED
MVDS	MVDS 826-76-EX	DS-826ELNS013.70	558+06	TO BE CALIBRATED
MVDS	MVDS 826-78-SB	DS-826SB014.00	574+85	TO BE CALIBRATED
MVDS	MVDS 826-79-EX	DS-826ELNS014.00	574+85	TO BE CALIBRATED
MVDS	MVDS 826-79B-SB	DS-826SB014.12	582+38	TO BE CALIBRATED
MVDS	MVDS 826-81-SB	DS-826SB014.38	591+00	TO BE CALIBRATED

MVDS	MVDS 826-83-EX	DS-826ELSB014.38	591+00	TO BE CALIBRATED
MVDS	MVDS 826-83A-SB	DS-826SB014.51	601+00	TO BE CALIBRATED
MVDS	MVDS 826-85-SB	DS-826SB014.68	610+16	TO BE CALIBRATED
MVDS	MVDS 826-86-EX	DS-826ELNS014.68	610+16	TO BE CALIBRATED
MVDS	MVDS 826-87-NB	DS-826NB014.96-A	624+06	TO BE REMOVED
MVDS	MVDS 826-88-EX	DS-826ELNB014.96	624+06	TO BE REMOVED
MVDS	MVDS 826-88A-NB	DS-826NB014.96-B	624+06	TO BE REMOVED
MVDS	MVDS 826-89-SB	DS-826SB014.99	626+53	TO BE CALIBRATED
MVDS	MVDS 826-90-EX	DS-826ELSB014.99	626+53	TO BE CALIBRATED
MVDS	MVDS 826-92-SB	DS-826SB015.35-A	645+65	TO BE CALIBRATED
MVDS	MVDS 826-93-SB	DS-826SB015.35-B	645+65	TO BE CALIBRATED
MVDS	MVDS 826-94-EX	DS-826ELNS015.35-A	645+65	TO BE CALIBRATED
MVDS	MVDS 826-95-EX	DS-826ELNS015.35-B	645+65	TO BE CALIBRATED
MVDS	MVDS 826-97-EX	DS-826ELNS015.70	663+43	TO BE CALIBRATED
MVDS	MVDS 826-98-SB	DS-826SB015.70	663+63	TO BE CALIBRATED
MVDS	MVDS 826-100-SB	DS-826SB016.08	681+50	TO BE CALIBRATED
MVDS	MVDS 826-100A-EX	DS-826ELSB016.08	681+50	TO BE CALIBRATED
MVDS	MVDS 826-81A-SB	DS-826SB016.21	690+42	TO BE CALIBRATED
RSS	RSS 826-13-SB	RSS-826SBNW103ST-WB	517+43	TO BE REMOVED
RSS	RSS 826-14-SB	RSS-826SBNW103ST-EB	525+92	TO BE REMOVED
WAP	WAP 826-07-WB	-	531+27	TO BE REMOVED
WAP	WAP 826-08-EB	-	531+27	TO BE REMOVED

2.3 Existing Structures

There are thirteen existing bridges within the study limits:

Table 2-9 | Existing Structures

Bridge ID	Bridge No.	Bridge Description	Existing Superstructure Type
B1	870856	Flyover bridge from SR 932 westbound to SR 826 Southbound	Steel Plate Girders
B2	870257	Southbound SR 826 over Metrorail	Concrete Beams
B3	870569	SR 826 west Frontage Road over Little River Canal	Concrete Slabs
B4	870570	SR 826 east Frontage Road over Little River Canal	Concrete Slabs
B5	870258	Southbound SR 826 over FEC Railroad	Concrete Beams
B6	870964	Southbound SR 826 at SR 934/NW 74th Street	Steel Plate Girders
B7A	870757	Southbound SR 826 at SR 932/NW 103rd Street	Concrete Beams
B7B	870995	Northbound SR 826 at SR 932/NW 103rd Street	Concrete Beams
B8	870975	SR 826 over S. River Dr. / Miami Canal / Okeechobee Road	Steel Plate Girders
B9	870758	SR 826 over Little River Canal	Concrete Beams
B10	870957	SR 826 over W 60th Street	Concrete Beams
B11	870766	SR 826 over NW 122th Street	Steel Plate Girders
B12	870467	SR 826 over NW 138th Street	Concrete Beams

	870977	US 27 NB to SR 826 SB flyover	Steel Plate Girders
	870755	SR 826 SB off ramp to NW 103rd St.	Concrete Beams
	870756	SR 826 NB on ramp from NW 103rd St.	Concrete Beams
	870643	SR 826 NB to I-75 NB flyover	Concrete Box
	871096	SR 826 Express Lanes to/from I-75 Express Lanes	Concrete Box

2.3.1 Historical Significance

The historical significance of the existing bridges within the project study area along SR 826 were reviewed to determine if any are considered historic or possess any substantial community value. All the bridges in the study area are not eligible for the National register of Historic Places as they are not more than 50 years old and have mostly been widened. As such, these bridges are either non-historic or have non-historic reconstruction dates.

2.4 Existing Lighting Conditions

The existing roadway lighting along SR 826 southbound and northbound mainline and ramps within the project limits consists of a combination of median barrier wall mounted light poles with 400 watt High Pressure Sodium (HPS) luminaires at 45 feet mounting height attached on two 15 feet bracket arms opposite to each other , bridge mounted light poles with 400 watt HPS luminaires at 45 feet mounting height attached one 15' bracket arm, and on the outside shoulders, barrier wall mounted light poles with 250 watt HPS luminaires at 35 feet mounting height attached on 8 feet bracket arm . Also, there are light poles mounted on the west outside barrier walls of SR 826 with a 35 feet mounting height measured from SR 826 roadway surface and one 15 feet bracket arm with a 400 watt HPS luminaire facing west side to illuminate NW 77th Avenue from Okeechobee Road to NW 103rd Street. The existing conventional lighting system appears to be in good physical condition.

SR 826 frontage road/W 20th Avenue East and West intersections with NW 103rd Street roadway lighting assemblies consists of 250 watt and 400 watt HPS luminaires at 35 feet and 45 feet mounting heights respectively attached on single bracket arms. The intersections of SR 826 frontage roads at W 60th Avenue East and West does not have existing FDOT lighting and there are few power poles with 250 watt HPS luminaires.

Existing conventional lighting assemblies at NW 77th Court (West Frontage Road), W 20th Avenue West (West Frontage Road), W 20th Avenue East (East Frontage Road) roadway segments excluding the intersections at NW 103rd Street and W 60th Street lighting consist of 250 watt HPS luminaires attached on aluminum, concrete and power company wooden poles with an approximate mounting height between 30 to 40 feet and one 8 feet bracket arm.

2.5 Pedestrian and Bicycle Facilities

SR 826/Palmetto Expressway is a limited access facility and does not have pedestrian and bicycle facilities.

No existing sidewalks are present along the West Frontage Road/NW 77th Avenue (section 87260152).

Existing sidewalk is located along the East Frontage Road/W 20th Avenue (section 87260151) along the right side of the roadway in three discontinuous segments covering most of the limits:

- From W 35th Street (sta. 202+01) to the second driveway at Westland Promenade (sta.

209+89)
- From W 39th Street (sta. 217+03) to the driveway at Citrus Health Center (sta. 226+06)
- From the driveway at Southern Winds Hospital (sta. 228+15) to W 44th Place (sta. 236+82)

East Frontage Road/W 20th Avenue East (section 87260298)

- Existing sidewalk along the RT side from NW 103rd Street (sta. 300+63) to W 64th Street (sta. 354+36)
- Existing sidewalk along the RT side from a point north of W 64th Street (sta. 357+42) to the end of the segment at NW 122nd Street/W 68th Street (sta. 373+34).

West Frontage Road/NW 77th Court (section 87260506)

- Existing sidewalk along the LT side from NW 103rd Street (sta. 400+91) to the end of the segment south of the Little River Canal (sta. 409+23).

West Frontage Road/W 20th Avenue West (section 87260521)

- Existing sidewalk along the LT side from W 52nd Street (sta. 413+19) to W 62nd Street (sta. 445+98).
- Existing sidewalk along the LT side from a point south of W 64th Street (sta. 450+26) to a point north of W 64th Street (sta. 455+22).
- Existing sidewalk along the LT side of W 67th Place, from a point east of W 21stAvenue (sta. 466+98) to the end of the segment at NW 122nd Street/W 68th Street (sta. 471+35).

On the frontage road, no existing designated bicycle facilities are present within the project limits.

2.6 Transit Facilities

2.6.1 Miami Dade Transit

2.6.1.1 Transit Ridership

MDT, the public transit authority in Miami-Dade County, has the following routes that service the arterials that cross SR 826: Routes 29, 33, 36, 95 and 132. There are currently no MDT stops within the study area. The Miami-Dade Transit Technical Report dated September of 2020, outlines the following average monthly boardings for the routes within the project limits to be as follows:

- Route 29: 13,388 monthly boardings
- Route 33: 40,412 monthly boardings
- Route 36: 58,566 monthly boardings
- Route 95 Express Golden Glades: 36,052 monthly boardings
- Route 132 Tri-Rail Doral Shuttle: 289 monthly boardings

Figure 2-21 to **Figure 2-25** show the detailed map of the transit routes within the project limits.

Figure 2-21 | Route 29

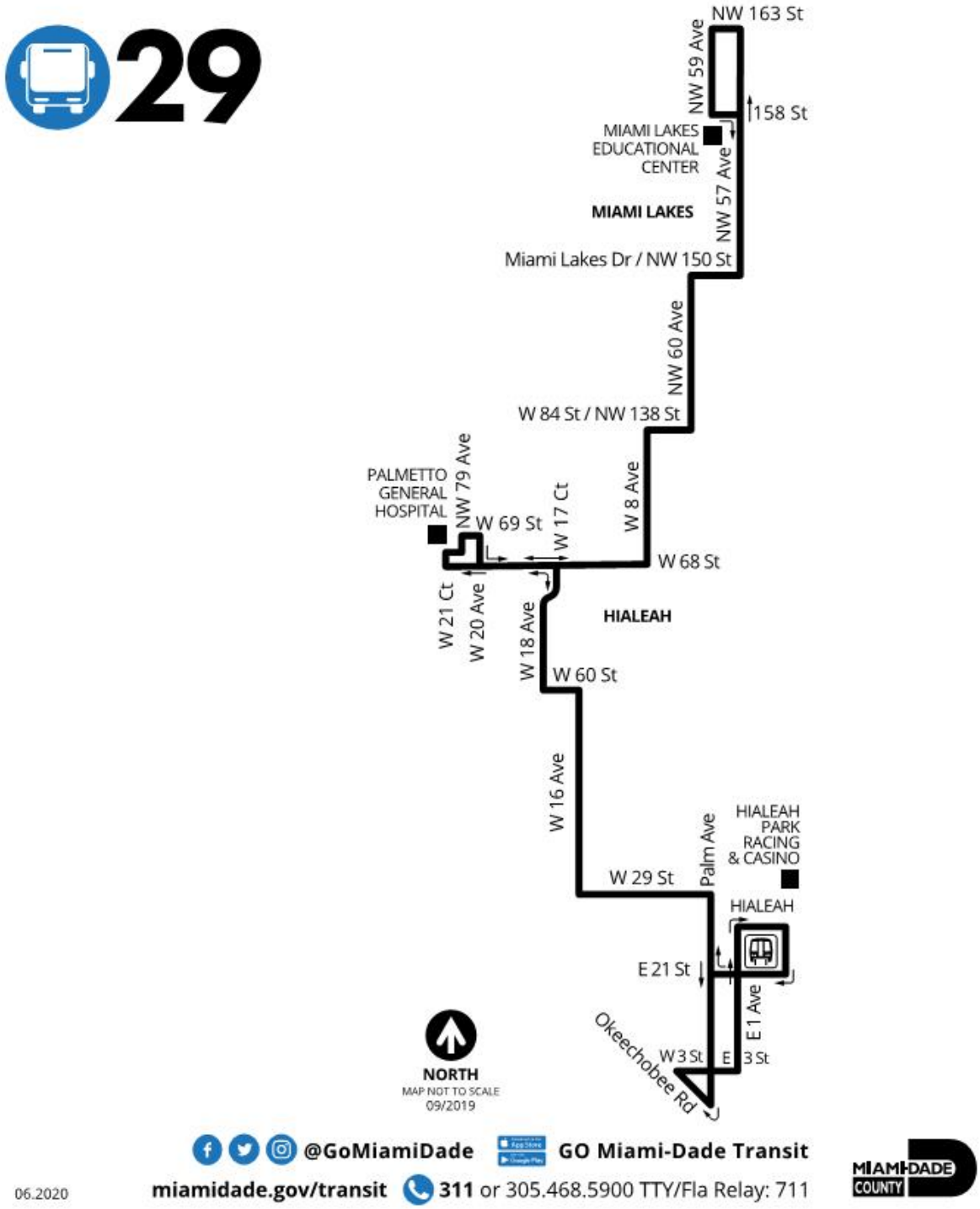


Figure 2-22 | Route 33

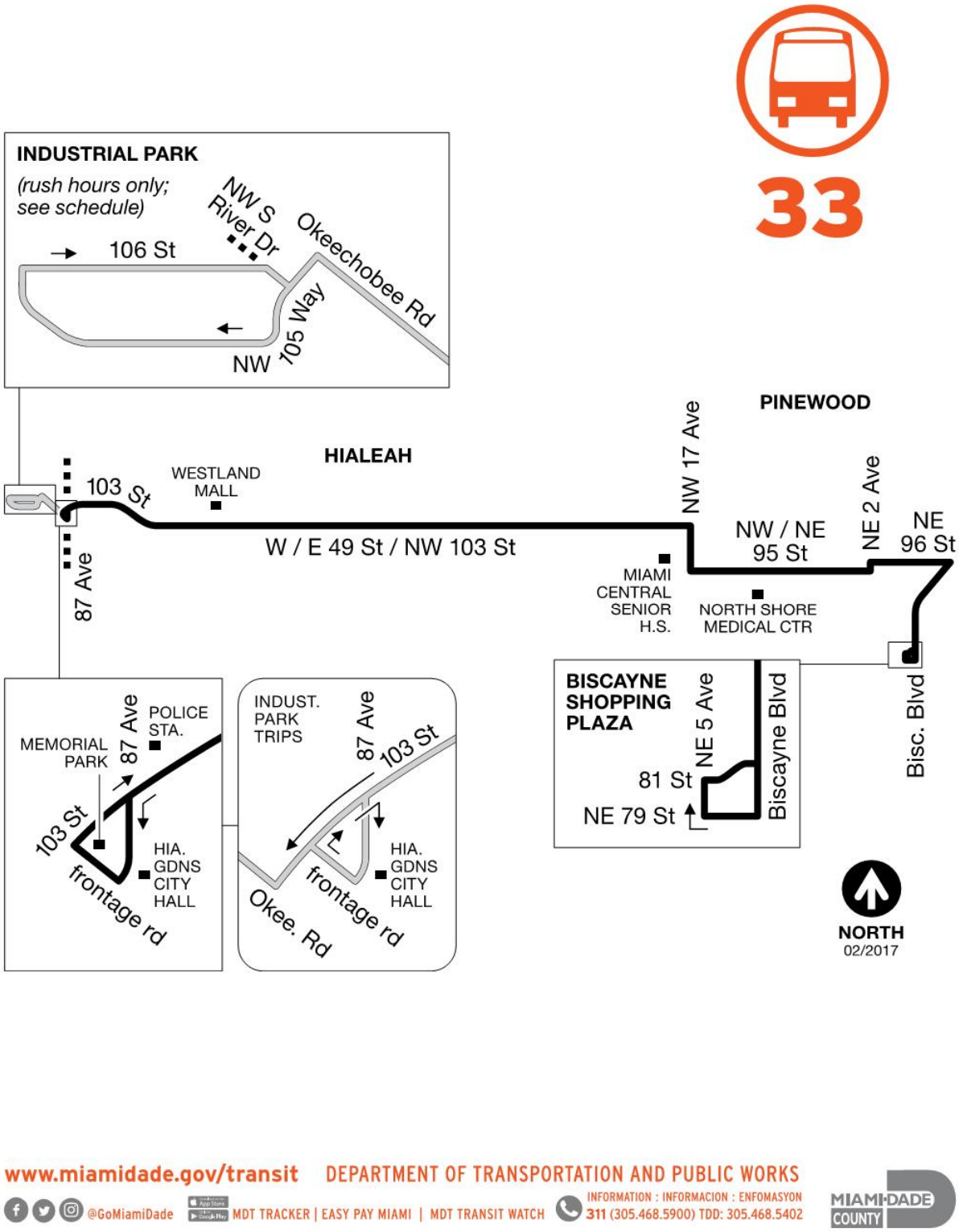


Figure 2-23 | Route 36

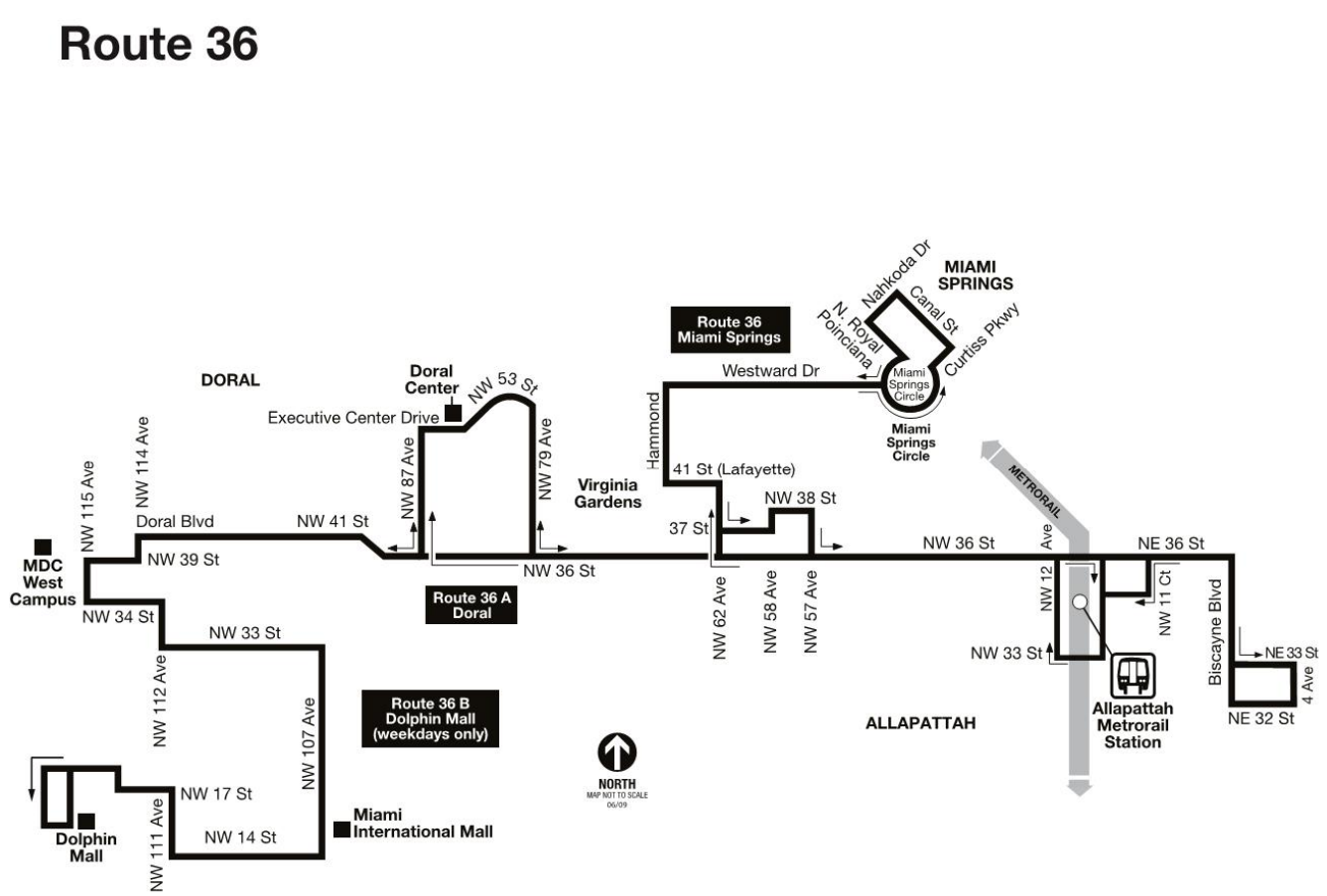


Figure 2-24 | Route 95

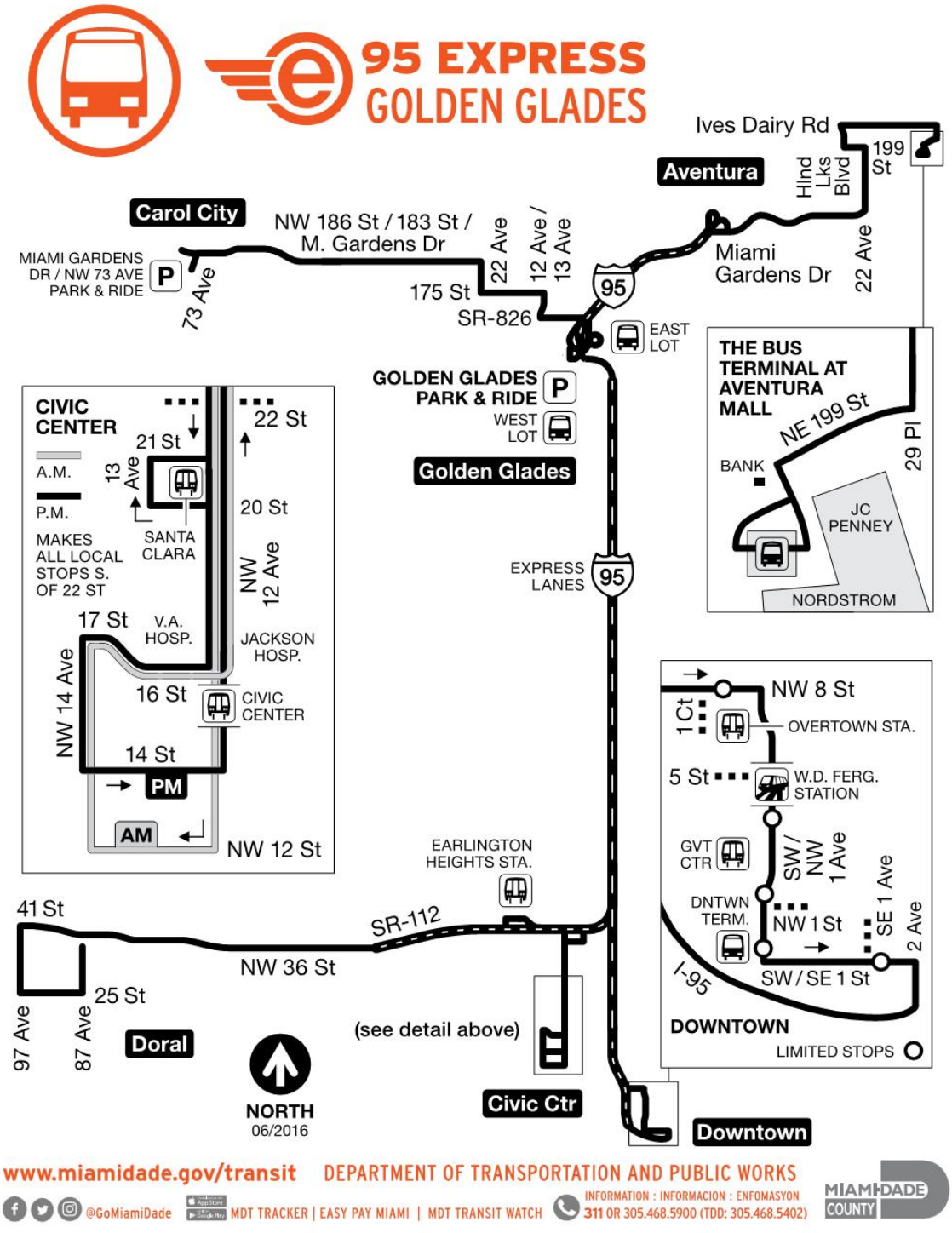
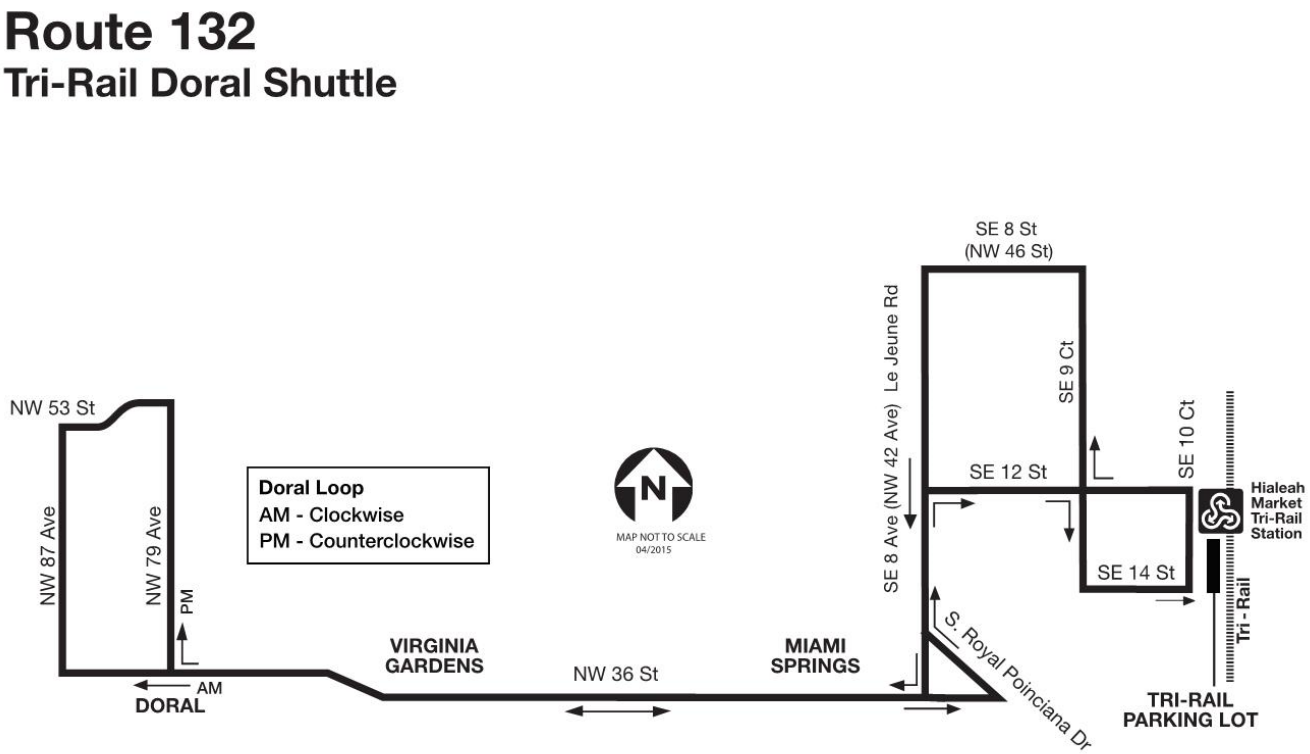


Figure 2-25 | Route 132



2.6.1.2 SMART Plan

As part of the Department of Transportation and Public Works (DPTW) ten-year program of projects, in an effort to implement mass transit projects in Miami-Dade County, the Strategic Miami Area Rapid Transit (SMART) Plan is the principal initiative. The SMART Plan intends to advance six of the People's Transportation Plan's (PTP) rapid transit corridors, along with a network system of nine Bus Express Rapid Transit (BERT) routes.

DTWP's ten-year implementation plan also includes operational, capital, and state of good repair projects.

2.6.1.2.1 Palmetto Metrorail Station

The existing Palmetto Metrorail Station at SR 826 at NW 74th will undergo improvements as part of the SMART Plan and includes the purchase of a semi-vacant parcel of land located immediately south of the Palmetto Metrorail Station for the purpose of constructing the Palmetto Intermodal Terminal. The proposed improvements also include the design and construction of a 1,000-space parking garage including long-term and short-term parking, kiss-and-ride, pool-and-ride, and a minimum of a 12-bus bay terminal.

2.6.1.2.2 Express Bus System

Within the project limits, there are existing services to be improved as part of the SMART plan, as well as new proposed services.

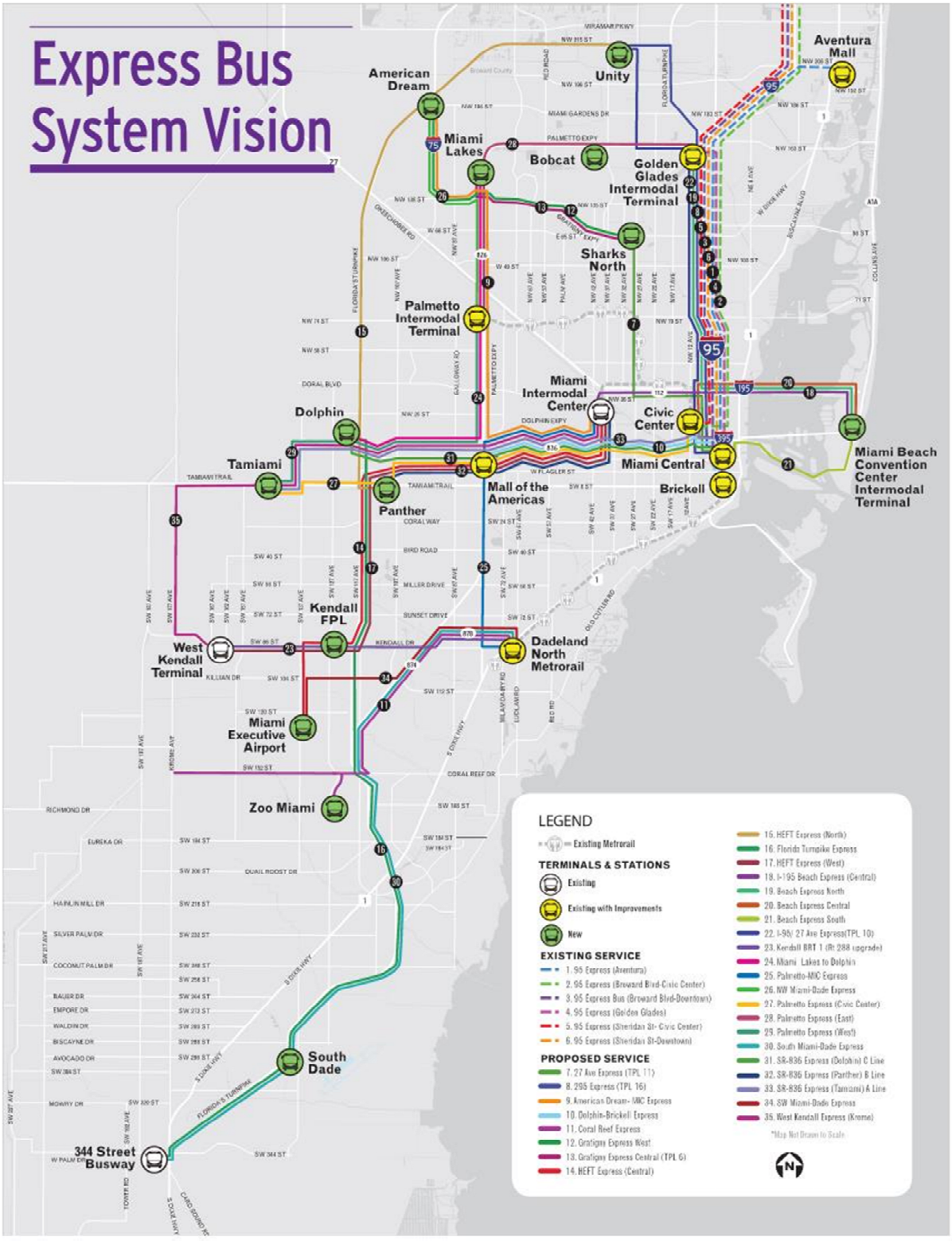
New proposed service routes within the project limits include:

American Dream-MIC Express, Express Bus service to be implemented from proposed American Dream Transit Terminal east of the Homestead Extension of Florida's Turnpike (HEFT) and west of I-75 between NW 170th Street and the intersection of I-75 and HEFT to the Miami Intermodal Center (MIC).

Palmetto Express (East), from the Palmetto Intermodal Terminal to Golden Glades Multimodal Terminal. Express bus service on EL with 10-minute headways during a.m./p.m. peak hours.

Palmetto Express (West), from Tamiami Station (SW 8th St/SW 147th Ave) to Palmetto Intermodal Terminal. Express bus service on EL with 10-minute headways during a.m./p.m. peak hours.

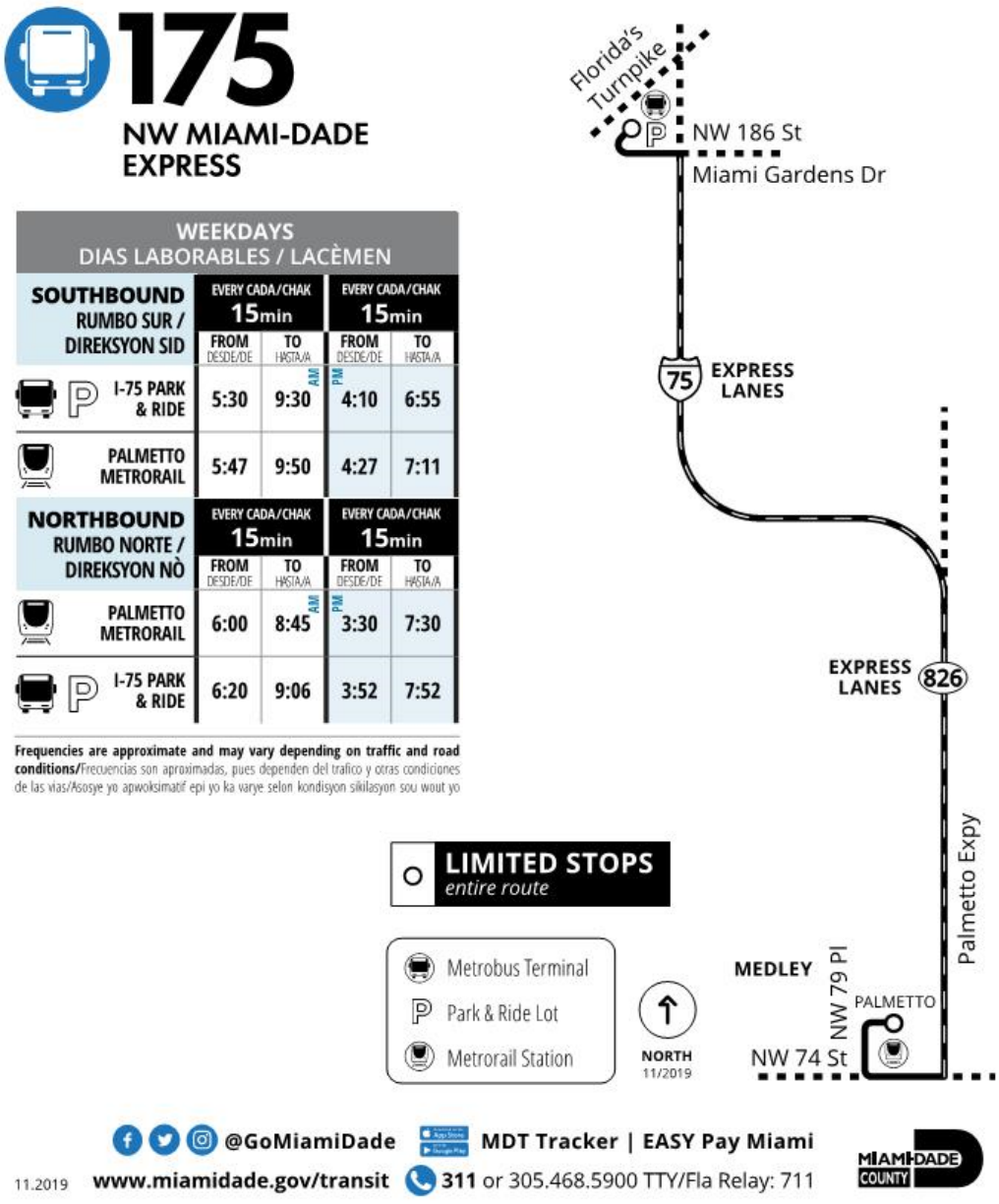
Figure 2-26 | Express Bus System Vision



2.6.1.2.3 Bus Express Rapid Transit (BERT) Network

There is one BERT Network route within the project limits. The N.W. Miami-Dade Express route, running from the Palmetto Metrorail Station to Miami Gardens Drive Park-n-Ride via the Palmetto expressway. This route began service on November 18, 2018, with weekday peak hour service runs every morning from 5:30-9:30 a.m. and every afternoon from 3:30-7:30 p.m. The N.W. Miami-Dade Express route is also a transit project outlined in the Miami-Dade Long Range Transportation Plan. Route location is shown in **Figure 2-21**.

Figure 2-27 | SMART Plan Map



2.6.2 Frontage Roads

Two existing bus stops are within the project limits along the East Frontage Road/W 20th Avenue, serving the City of Hialeah Transit System, Flamingo Route.

NB Bus Stop at W 20th Avenue, north of W 41th Street

- The existing bus stop meets criteria for a sidewalk connection and boarding & alighting area.
- The existing sidewalk connection is missing a detectable warning surface at the edge of pavement.
- The existing unobstructed sidewalk width is sub-standard (less than 4.0 feet) at the existing bus bench.

NB Bus Stop at W 20th Avenue, south of W 44th Place

- The existing bus stop does not meet criteria for a sidewalk connection or boarding & alighting area; there is no sidewalk connection between the existing sidewalk and edge of pavement.

2.6.3 Metrorail

MDT Metrorail Green Line crosses under SR 826 just north of NW 74th Street to a station just west of SR 826.

2.7 Existing Drainage Systems

The existing drainage within the project limits can be divided into three systems based on existing collection and conveyance systems, interconnected stormwater management facilities, and outfalls. The existing drainage systems have been delineated as follows:

2.7.1 Existing Drainage System SR 826

The project is located in northwestern Miami-Dade County, within the City of Hialeah, City of Doral, and The Town of Medley. In addition, the project runs along Unincorporated Miami-Dade County, and is within the jurisdictional boundary of the South Florida Water Management District (SFWMD), USACE, and Miami-Dade Regulatory and Economic Resources (DRER). The proposed roadway improvements are within the SFWMD Miami Canal, Little River Canal, Peter's Pike Canal, and NW 122 St. Canal Basins.

SFWMD and FDOT have established several criteria for water quality, depending on the proposed type of stormwater treatment facility. The existing conditions throughout the project limits generally consist of an open and close drainage system with swale, ditch bottom inlets along both sides of the roadway, French Drains, and Infield retention pond. Existing facilities is providing water quality treatment and attenuation of roadway runoff.

2.7.2 Existing Drainage System Frontage Road East

The project is located in northwestern Miami-Dade County, within the City of Hialeah, and City of Hialeah Gardens, and is within the jurisdictional boundary of the South Florida Water Management District (SFWMD), USACE, and Miami-Dade Regulatory and Economic Resources (DRER). The proposed roadway improvements are within the SFWMD Little River Canal basin.

SFWMD and FDOT have established several criteria for water quality, depending on the proposed type of stormwater treatment facility. The existing conditions throughout the project limits generally consist of an open drainage system with swale and ditch bottom inlets along both sides of the roadway. Existing facilities is not providing water quality treatment or attenuation of roadway runoff.

2.7.3 Existing Drainage System Frontage Road West

The project is located in northwestern Miami-Dade County, within the City of Hialeah, and City of Hialeah Gardens, and is within the jurisdictional boundary of the South Florida Water Management District (SFWMD), USACE, and Miami-Dade Regulatory and Economic Resources (DRER). The proposed roadway improvements are within the SFWMD Little river Canal basin.

SFWMD and FDOT have established several criteria for water quality, depending on the proposed type of stormwater treatment facility. The existing conditions throughout the project limits generally consist of an open drainage system with swale and ditch bottom inlets along both sides of the roadway. The West Frontage Road/NW 77th Avenue has a trench drain along the west side of the roadway from north of NW 98fh Street to NW 103'd Street. Existing facilities is not providing water quality treatment or attenuation of roadway runoff.

2.8 Geotechnical Characteristics

Based on the soil data from the United States Department of Agriculture, Natural Resources Conservation Service (NRCS, 2019) for Miami-Dade County, the project study area is comprised of six (6) mapped soil units. According to the Hydric Soils of Florida Handbook (Hurt, 2007), two (2) of the six (6) soil types identified within the project study area are classified as hydric; the remaining four (4) types are not classified as hydric.

2.9 Utilities

Initial utility agency contact for this project has been coordinated through the District's Utility Coordinator. Existing utility owners and their respective contact personnel are provided in **Table 2-9**. Utility Design ticket is attached in **Appendix D**.

Table 2-10 | Existing Utility Owners

Type	Location	Utility Agency/Owner	Contact Person	Contact Information
Telephone		AT&T Florida	Carlos Moreno	O: (305) 929-4597 M: (954) 531-5876 cm8802@att.com
CATV, Fiber		Atlantic BroadBand	Edwin Zambrana Javares Hall	(305) 861-8069 Ext. 5411 EZambrana@atlanticbb.com (305) 213-9908
Electric		Buckeye Development and Logistics, LLC	Daniel G. Magnum	O: (832) 325-1626 M:: (832) 541-3946 DMangum@buckeye.com
CATV, Fiber		Lumen (CenturyLink)	Francisco Azuri	(786) 266-1713 francisco.azuri@lumen.com
		City of North Miami Beach	Karim Rossy	Karim.Rossy@jacobs.com O: (305) 948-2980 D: (305) 947-7581 ext.7962
CATV, Fiber		Comcast	Mike Connell	(754) 221-1304 Michael_Connell@comcast.com
Fiber		Crown Castle Fibernet – Ancillary Network Under Crown Castle Branding	Danny Haskett	Danny.Haskett@crowncastle.com O: (786) 610-7073 M: (786) 246-7827
Gas		Florida City Gas	Elio A. Bustos	O: (305) 835-3618 M: (786) 810-8159 Elio.Bustos@NextEraEnergy.com
Gas		Florida Gas Transmission	Joe Sanchez	O: (407) 838-7171 M: (407) 808-4607 joseph.e.sanchez@energytransfer.com
Electric		FPL (Distribution)	Angel A. Vargas	Ph: (305) 442-5129 Cell: (305) 495-9253 angel.vargas@fpl.com
Electric		FPL Transmission	Michael Foley	O: (561) 904-3640 M: (561) 523-9896 Michael.Foley@fpl.com
Fiber		Hotwire	Walter Sancho-Davila	O: (954) 699-0900 M: (954) 248-7396 walter.sancho-davila@hotwirecommunication.com
Water, Sewer		Miami-Dade Water and Sewer Dept.	Patrick Chong	(786) 552-4416 PCHON@miamidade.gov
Telephone		MCI/Verizon	Juan Haber	M: (786) 224-8576 juan.haber@verizon.com
Gas		Suburban Propane	Dimitry Pressman	O: (305) 635-4427 F: (305) 891-0834 DPressman@suburbanpropane.com
		Town of Miami Lakes	Carlos Acosta	305-364-6100 Ext: 1129 acostac@miamilakes-fl.gov CC: publicworks@miamilakes-fl.gov

2.10 Design and Posted Speeds

The posted speed limits for the roadways within the study limits are as follows:

- SR 826/Palmetto Expressway: 55 miles per hour
- SR 826/Palmetto Expressway Ramps: 30 miles per hour
- SR 826 East Frontage Road: 20-35 miles per hour

The design speed for the roadways within the project limits are as follows:

- SR 826/Palmetto Expressway: 60 miles per hour
- SR 826/Palmetto Expressway ramps: 30-40 miles per hour
- SR 826 East Frontage Road: 30-40 miles per hour

2.11 Traffic Characteristics

2.11.1 Existing Conditions

Within the project limits, SR 826/Palmetto Expressway is classified as 'Principal Arterial-Other Freeways and Expressways' and consists of six to eight general use lanes and zero to four express (managed) lanes; the typical section varies throughout the project segment. The current typical along the SR 826/Palmetto Expressway northbound consists of one express lane throughout the entire study limits with five general purpose lanes from NW 36th Street to Okeechobee Road and four general purpose lanes from Okeechobee Road to I-75 interchange. The current typical along the SR 826/Palmetto Expressway southbound consists of a single express lane and three general purpose lanes from south of NW 54th Street to south of I-75 interchange; two express lanes and four general purpose lanes from south of I-75 Interchange to north of NW 103rd Street interchange; two express lanes and three general purpose lanes carried through the NW 103rd Street interchange; and, two express lanes and four general purpose lanes from south of NW 103rd Street interchange to north of NW 36th Street interchange.

In addition, SR 826/Palmetto Expressway is part of the state's emergency evacuation network and is a designated Strategic Intermodal System (SIS) highway corridor, providing access via SR 934/NW 74th Street (also known as Hialeah Expressway) and surface streets to the Miami Hialeah FEC Intermodal Terminal, an SIS Freight Rail Terminal.

In addition to the SR 826 facility, frontage roads are located throughout the project limits on both the east and west sides of SR 826. The limits and typical sections of The Frontage Roads are discussed in section 2.1.1. The Frontage Roads are an Urban Local facility generally consisting of a two-lane undivided typical section with flush shoulders and some segments with one-way undivided or two-way divided typical sections with curb & gutter.

Please see the Traffic Analysis Methodology Report, Calibration Report, and Traffic Operations Analysis Summary Report for more information.

2.12 Existing Traffic Volumes

2.12.1 Data Collection

Data collection for the study consists of information from various sources. It is comprised of existing information and field collected data. Sources of information collected include, but is not limited to:

- StreetLight Insight Origin-Destination (OD) Data - used to validate the OD matrices developed for the Vissim simulation;
- Traffic Count Information– used to create General Purpose, Ramp, and Express Lane volume targets.
    - Florida Traffic Information (FTI)
    - Traffic Management Center (TMC)
    - Turnpike Transactions (TPK)
    - SunGuide;
- Transit schedules;
- Signal Timing

Traffic Counts:

Due to the ongoing pandemic, current field traffic count data would not best represent the 2019 traffic condition. Traffic count data supplied by FDOT that represented conditions in the Fall of 2019 are used for analysis. Based on the historical data provided by FDOT, sufficient count information does not exist along the crossroads within the limits of our study area.

Field Data:

Field data collected in Fall of 2019 is used for microsimulation calibration purposes including SR 826 and I-75 mainline peak period speeds from the Regional Integrated Transportation Information System (RITIS). Field visits were also conducted to collect information on existing driver behavior and congestion levels and to verify signal phasing information such as protected/permitted left-turn operations, right-turn-on-red restrictions, phasing, etc. Existing signal plans and timing information for signalized intersections will be obtained from Miami-Dade County Transportation and Public Works Department. Due to current conditions, it is not possible to collect any further field data.

2.13 Modeling and Travel Demand

2.13.1 VISSIM Model Development and Calibration

Vissim models using 15-minute flow rates were developed for a 3-hour AM and PM peak period and calibrated to existing conditions. The 2019 update of FHWA's Traffic Analysis Toolbox Volume III: Guidelines for Applying Traffic Microsimulation Modeling Software and 2014 FDOT Traffic Analysis Handbook were used as a guideline for the development of the project Vissim models.

Existing Conditions Vissim Model Development:

- A Vissim model for the SR 826 general purpose lanes, SR 826 express lanes, I-75 mainline, I-75 express lane, as well as these facilities' ramps was developed for existing conditions. The model utilized a 60-minute seeding period and will be calibrated using speed data from RITIS. Observed queue spillback onto the mainline from the ramp terminals will require the addition of a ramp terminal signal in order to calibrate the mainline. Terminal intersection ramp movement flow rates are gathered from FTI and TMC ; these rates emulated the influence of the ramp terminal on the mainline flow by combining the flow rates with signal timing information.
- Existing Vissim models were validated to the 2019 existing year traffic counts provided by FDOT and OD patterns gathered from Streetlight Data.
- The calibration of the existing AM and PM peak period models targeted the thresholds indicated in the FDOT Traffic Analysis Handbook Table 7-7 Classical Model Calibration Targets shown in **Table 2-10**.

Table 2-11 | Vissim Calibration Targets[1]

Calibration Criteria	Calibration Target/Goal
Traffic Volume	Simulated and measured link volumes for more than 85% of links to be: • Within 100 vph for volumes less than 700 vph • Within 15% for volumes between 700 vph and 2700 vph • Within 400 vph, for volumes greater than 2700 vph.
	Simulated and measured link volumes for more than 85% of links to have a GEH statistic value of five (5) or lower.
	Sum of link volumes within calibration area to be within 5%.
	Sum of link volumes to have a GEH statistic value of 5 or lower.
Speed	Modeled average speeds on I-75 to be within +/- 10 mph of field-measured speeds on at least 85% of all RITIS detector locations.
Visualization	Check consistency with field conditions of the following: on- and off-ramp queuing; weaving maneuvers; patterns and extent of queue at intersections and congested links; lane utilization/choice; location of bottlenecks; etc.
	Verify no unrealistic U-turns or vehicles exiting and reentering the network.

[1]source: FDOT Traffic Analysis Handbook, Table 7-7 Classical Model Calibration Targets.

2.13.2 Selection of Measures of Effectiveness (MOE)

Site-specific MOEs used to evaluate and compare the alternatives were as follows:

- Freeway Segments – Volume, density, travel speed, congestion charts; and
- Off Ramps – Volume, maximum queue lengths.

In addition to the site-specific MOEs mentioned above, network wide MOEs were also evaluated and are described below:

- Total Travel Time;
- Total Delay Time;
- Vehicles Arrived;
- Average Delay Time;
- Latent Delay Time;
- Latent Vehicles; and
- Total Delay plus Latent Delay.

3.0 Design Controls and Criteria

3.1 Design Controls

The project controls that were used in the alternatives development is shown in **Tables 3-1** to **3-3.**

Table 3-1 | Project Design Controls: SR 826

Design Element	SR 826 (Mainline)
Functional Classification	Freeway/Expressway
Context Classification	L.A. Facility
Access Class	Freeway
Highway System	National Highway System Strategic Intermodal System State Highway System
Design Speed (mph)	60

Table 3-2 | Project Design Controls: SR 826 Ramps

Design Element	SR 826 (Ramps)
Functional Classification	Freeway/Expressway
Context Classification	L.A. Facility
Access Class	Freeway
Highway System	National Highway System Strategic Intermodal System State Highway System
Design Speed (mph)	30-40

Table 3-3 | Project Design Controls: SR 826 Frontage Roads

Design Element	SR 826 (Ramps)
Functional Classification	Local
Context Classification	C3C – Suburban Comm
Access Class	N/A
Highway System	N/A
Design Speed (mph)	30-40

3.2 Design Criteria

The SR 826 mainline and ramps design criteria utilized in the design of the alternatives for this project are in conformance with the following publications and shown in **Table 3-4** to **Table 3-6**.

- Florida Design Manual (2021), Florida Department of Transportation, Part 1 and 2
- Drainage Manual, Florida Department of Transportation
- Structures Manual, Florida Department of Transportation
- Standard Plans for Road and Bridge Construction, Florida Department of Transportation

The SR 826 frontage roads design criteria utilized in the design of the alternatives for this project are in conformance with the following publications and shown in **Table 3-7**.

- Florida Design Manual (2021), Florida Department of Transportation, Part 1 and 2
- American Association of State Highway and Transportation Officials (AASHTO) A Policy on Geometric Design of Highways and Streets (2011, 6th edition)
- FDOT Utility Accommodation Manual (UAM), 2017 edition
- United States Department of Justice 2010 Americans with Disabilities Act (ADA) Standards for Accessible Design
- United States Department of Transportation 2006 ADA Standards for Transportation Facilities
- FDOT District 6 Design Handbook (revised October 2017)
- American with Disabilities Act Accessibility Guidelines (ADAAG)
- Public Right-of-Way Accessibility Guidelines (PROWAG)

Table 3-4 | Design Criteria: SR 826

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01			
Design Element		**Controlling Criteria**	
Functional Classification		Interstate	
Design Speed (mph):		60	
Lane Width:		12'	2021 FDM Table 210.2.1
Shoulder Width: Full (Paved)	Outside	12'	2021 FDM Table 211.4.1
	Median	12'	2021 FDM Table 211.4.1
Express Lane Buffer Width:		4'	2021 FDM Section 211.3.3
Border Width:		10' from back of Barrier or Retaining Wall	2021 FDM Section 211.6.1
Horizontal Alignment:			
Max deflections in alignment withouth a curve:		0°45'00"	2021 FDM Section 211.7.1
Length of Curve - Desirable (Minimum):		1800' (900')	2021 FDM Table 211.7.1
Min. Radius:			
	e_{max} = 10%	1146'	2021 FDM Table 210.9.1
	N.C	11709'	2021 FDM Table 210.9.1
Max Superelevation:		10%	2021 FDM Section 211.8
Superelevation Transition Rate:		1:170	2021 FDM Table 210.9.3
Vertical Alignment:			
Maximum Grades:		3%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:		0.40%	2021 FDM Table 210.10.2
Minimum Profile Grade		0.50%	2021 FDM Section 210.9.1
Min. Curve Length:	Crest:	1000'	2021 FDM Table 211.9.3
	Sag:	800'	2021 FDM Table 211.9.3
K-Value:	Crest:	193	2021 FDM Table 211.9.2
	Sag:	157	2021 FDM Table 211.9.2
Horizontal Clear Zone - Mainline (Aux. Lanes):		36' (24')	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		820'	2021 FDM Table 211.10.1
Cross slope:			
First 2 lanes:		2%	2021 FDM Figure 211.2.1
Next 2 lanes:		3%	2021 FDM Figure 211.2.1
More than 4 Lanes:		3.5%	2021 FDM Figure 211.2.1
Vertical Clearance:			
Over Roadways:		16'	2021 FDM Table 260.6.1
Overhead Sign Structures:		17'-6"	2021 FDM Section 210.10.3
Overhead DMS Sign Trusses:		19'-6"	2021 FDM Section 210.10.3
Signals, mast arms, or other structures		17'-6"	2021 FDM Section 210.10.3
R/R		23.5'	2021 FDM Table 260.6.1
Base Clearance:		3'	2021 FDM Section 210.10.3

Table 3-5 | Design Criteria: Ramps (30 mph)

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01			
Design Element		**Controlling Criteria**	
Functional Classification		Interstate - Ramp	
Design Speed (mph):		40	
Lane Width:		12'	2021 FDM Table 211.2.1
Shoulder Width: Full (Paved)	Outside	10'	2021 FDM Table 211.4.1
	Median	8'	2021 FDM Table 211.4.1
Border Width:		10' from back of Barrier or Retaining Wall	2021 FDM Table 211.6.1
Horizontal Alignment:			
Max deflections in alignment withouth a curve:		2°00'00"	2021 FDM Table 211.7.1
Length of Curve - Desirable (Minimum):		600' (400')	2021 FDM Table 211.7.1
Min. Radius:			
	e_{max} = 10%	441'	2021 FDM Table 210.9.1
	N.C	5560'	2021 FDM Table 210.9.1
Max Superelevation:		10%	2021 FDM Table 211.8
Superelevation Transition Rate:		1:175	2021 FDM Table 210.9.3
Vertical Alignment:			
Maximum Grades:		6%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:		0.80%	2021 FDM Table 210.10.2
Min. Curve Length:	Crest:	120'	2021 FDM Table 211.9.3
	Sag:	120'	2021 FDM Table 211.9.3
K-Value:	Crest:	44	2021 FDM Table 211.9.2
	Sag:	64	2021 FDM Table 211.9.2
Horizontal Clear Zone Width:		10'	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		305'	2021 FDM Table 211.10.2

Table 3-6 | Design Criteria: Ramps (40 mph)

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01			
Design Element		**Controlling Criteria**	
Functional Classification		Interstate - Ramp	
Design Speed (mph):		40	
Lane Width:		12-15'	2021 FDM Table 211.2.1
Shoulder Width: Full (Paved)	Outside	6'	2021 FDM Table 211.4.1
	Median	6'	2021 FDM Table 211.4.1
Border Width:		10' from back of Barrier or Retaining Wall	2021 FDM Table 211.6.1
Horizontal Alignment:			
Max deflections in alignment withouth a curve:		2°00'00"	2021 FDM Table 211.7.1
Length of Curve - Desirable (Minimum):		450' (400')	2021 FDM Table 211.7.1
Min. Radius:			
e_{max} = 10%		239'	2021 FDM Table 210.9.1
N.C		3349'	2021 FDM Table 210.9.1
Max Superelevation:		10%	2021 FDM Table 211.8
Superelevation Transition Rate:		1:175	2021 FDM Table 210.9.3
Vertical Alignment:			
Maximum Grades:		7%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:		1.00%	2021 FDM Table 210.10.2
Min. Curve Length:	Crest:	90'	2021 FDM Table 211.9.3
	Sag:	90'	2021 FDM Table 211.9.3
K-Value:	Crest:	19	2021 FDM Table 211.9.2
	Sag:	37	2021 FDM Table 211.9.2
Horizontal Clear Zone Width:		10'	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		200'	2021 FDM Table 211.10.2
Vertical Clearance:			
Over Roadways:		16'	2021 FDM Table 260.6.1

Table 3-7 | Design Criteria: Frontage Roads

SR 826 Frontage Roads from Okeechobee Road to NW 103 Street (FPID 441830-1-52-01) and SR 826 Frontage Roads from NW 103 Street to NW 122 Street (FPID 441831-1-52-01)				
Design Element			**Controlling Criteria**	
Functional Classification				
Design Speed (mph):				
Lane Width:		Travel Lanes	12'	2021 FDM Table 210.2.1
		Auxiliary Lanes	12'	2021 FDM Table 210.2.1
Cross Slope:	Travel Lanes	Min.	0.015	2021 FDM Table 210.2.3
		Max.	0.030	
	Outside Shoulder	Min.	0.015	
		Max.	0.080	
	Inside Shoulder	Min.	0.020	
		Max.	0.080	
Median Width			15.5'	2022 FDM Table 210.3.1
Shoulder Width:	Outside Shoulder	Full Width	6'	2021 FDM Table 210.4.1
		Paved Width	5'	2021 FDM Table 210.4.1
	Inside Shoulder	Full Width	6'	2021 FDM Table 210.4.1
		Paved Width	2'	2021 FDM Table 210.4.1
Border Width:			8' from shoulder point	2022 FDM Table 210.7.1
Horizontal Alignment:				
Max. deflections in alignment without a curve:			2°00'00"	2021 FDM Section 210.8.1
Length of Horizontal Curve			400'	2021 FDM Table 210.8.1
Min. Radius:			223' (DS=30) 332' (DS=35)	2021 FDM Table 210.8.1
Max Superelevation:			0.100	2021 FDM Section 210.9.2
Vertical Alignment:				
Max. change in grade without Vertical Curve:			1.00% (DS=30) 0.90% (DS=35)	2021 FDM Table 210.10.2
Min. distance between VPIs on curbed roadways			250'	2021 FDM Section 210.10.1.1
Min. grade on curbed roadways			0.30%	2021 FDM Section 210.10.1.1
K-Value:		Crest:	19 (DS=30) 29 (DS=35)	2021 FDM Table 210.10.3
		Sag:	37 (DS=30) 49 (DS=35)	
Min. Curve Length:		Crest/Sag:	90 (DS=30) 105 (DS=35)	2021 FDM Table 210.10.4
Vertical Clearance:				
Signals, mast arms, or other structures			17'-6" (new) 17'-0" (existing)	2021 FDM Section 210.10.3
Bridges over Roadways:			16'-0" (new) 14-6" (existing)	2021 FDM Table 260.6.1
Min. Stopping Sight Distance: (Grades < 2%)			200' (DS=30) 250' (DS=35)	2021 FDM Table 210.11.1
Clear Zone: (flush shoulder section)	**RRR**	Travel Lanes & Auxiliary Lanes	6'	2021 FDM Table 215.2.1
	Control Zone	Travel Lanes	12' (DS=30) 14' (DS=35)	
		Auxiliary Lanes	10'	
Min. Lateral Offset: (curb & gutter section)	Light Poles, Signal Poles, ITS Poles, Trees		1.5' from face of curb	2021 FDM Table 215.2.2
	Bridge Piers & Abutments		16' from edge of travel	
Sidewalk Width:		Existing	4'	2021 FDM Table 222.2.1
		Proposed	6'	
Bicycle Facilities:			4' paved shoulder	2021 FDM Section 223.2.2
Bridge Width:			4' shoulder	2021 FDM Table 260.9.1

4.0 Alternatives Analysis

Evaluation of transportation projects to select the most desirable alternative is often based on a wide range of criteria (i.e., traffic operations and safety, environmental impacts, construction costs, drainage impacts, right-of-way costs, etc.) that reflect concerns of all the key stakeholders. One improvement build alternative was considered for improving traffic operations and safety throughout the SR 826/Palmetto Expressway corridor. The following sections summarize the No-Action, and TSM&O alternatives and the evaluation and elimination of alternatives.

4.1 No-Build Alternative

The No-Build Alternative assumes that no improvements would be implemented within the project corridor. It serves as a baseline for comparison against the Build Alternative. It will, however, include on-going construction projects and all funded or programmed improvements scheduled to be opened to traffic in the analysis years being considered. These improvements must be part of the FDOT's adopted Five-Year Work Program, Miami-Dade County Metropolitan Planning Organization (MPO), Long Range Transportation Plan (LRTP), transportation elements of Local Government Comprehensive Plans (LGCP), or developer-funded transportation improvements specified in approved development orders. This alternative is considered to be a viable alternative to serve as a comparison to the study's proposed Build Alternative.

The advantage of the No-Build Alternative is that it requires no expenditure of public funds for design, right-of-way acquisition, construction or utility relocation. In addition, there would be no disruptions due to construction from the project and no direct or indirect impacts to the environment and/or the socio-economic characteristics of the project area. However, the No-Build Alternative does not address the purpose and need of the project and operational and safety conditions within the project area will become progressively worse as traffic volumes continue to increase.

4.2 Build Alternative

The proposed improvements evaluated for the SR 826/Palmetto Expressway consisted of three elements:

1. Improvements to the mainline of southbound SR 826 to retrofit the Express Lane ingress/egress points and widening between NW 74th Street and NW 103rd Street
2. Improvements to the mainline of northbound SR 826 is limited to the widening of the inside shoulder at the NW 103rd Street interchange, and
3. Improvements to the frontage roads to preserve and extend the pavement life.

4.2.2 Mainline SR 826 Build Alternative

The SR 826/Palmetto Expressway Capacity Improvement project (FPID 447165-1-52-01) consists of improvements in the southbound direction to retrofit the EL ingress/egress access points, widening of the mainline between NW 74th Street and SR 25 / Okeechobee Road and between SR 25 / Okeechobee Road and NW 103rd Street, widening of the NW 103rd St on/off ramps, widening of bridges over NW 74th Street, Metrorail corridor, FEC corridor, and NW 103rd Street, and a comprehensive milling and resurfacing plan. Modification of the NW 103rd Street westbound flyover on-ramp on to SR 826 southbound is also being conducted to accommodate SR 826 southbound mainline widening.

Improvements in the northbound direction include widening of the mainline at the NW 103rd Street interchange to correct substandard shoulder width created under the Northbound Express Lanes Interim Improvements project, widening along NW 103rd Street off-ramp, widening of bridge over NW 103rd Street, and milling and resurfacing. Furthermore, improvements include the installation of a new Tolling Site along both the northbound and southbound directions that will require a specific pavement design to be implemented 50 feet north/south of the gantry location.

The proposed SR 826/Palmetto Expressway southbound typical section consists of a single express lane and five general purpose lanes from I-75 Interchange to NW 103rd Street interchange and two express lanes and four general purpose lanes from NW 103rd Street interchange to north of NW 36th Street interchange.

There are no changes to the typical section along the SR 826/Palmetto Expressway northbound other than the provision of a wider inside shoulder at the NW 103rd Street interchange.

Project improvements at the intersection of NW 103rd Street/W 49th Street and SR 826 Northbound Off-Ramp/W 20th Avenue East, identified in the Traffic Operations Technical Memorandum, including:

- Signalize the westbound right turn movement at the W 20th Avenue intersection to provide a protected pedestrian phase for pedestrians to safely cross within the marked crosswalk. Note that a new traffic signal controller is required to allow operation of the westbound right turn movement independently from the existing signal at the intersection.
- Expand existing channelization island located on the northeast corner of the intersection to increase the refuge area provided for pedestrians since large groups of students cross at this location.
- Reduce the curb radius at the southeast corner of the intersection and construct a truck apron.
- Install “No Pedestrian Crossing” (R9-3) and “Use Crosswalk” (R9-3P) signs on the east and west sides of W 20th Avenue at approximately 100 feet north of SR 932/NW 103rd Street to discourage pedestrians from crossing midblock and to direct pedestrians to use the existing marked crosswalk at the signalized intersection.
- Remove the pedestrian crossing (W11-2) sign located on the far side of the intersection facing northbound traffic.

The Build Alternative for SR 826 is shown in **Figure 4-1**.

4.2.3 Frontage Road Build Alternative

In conjunction with SR 826/Palmetto Expressway Capacity Improvement project improvements, the Department has included the SR 826 Frontage Road RRR improvements from Okeechobee Road to NW 103rd St (FPID 441830-1-52-01) and from NW 103rd St to NW 122nd St (FPID 441831-1-52-01).

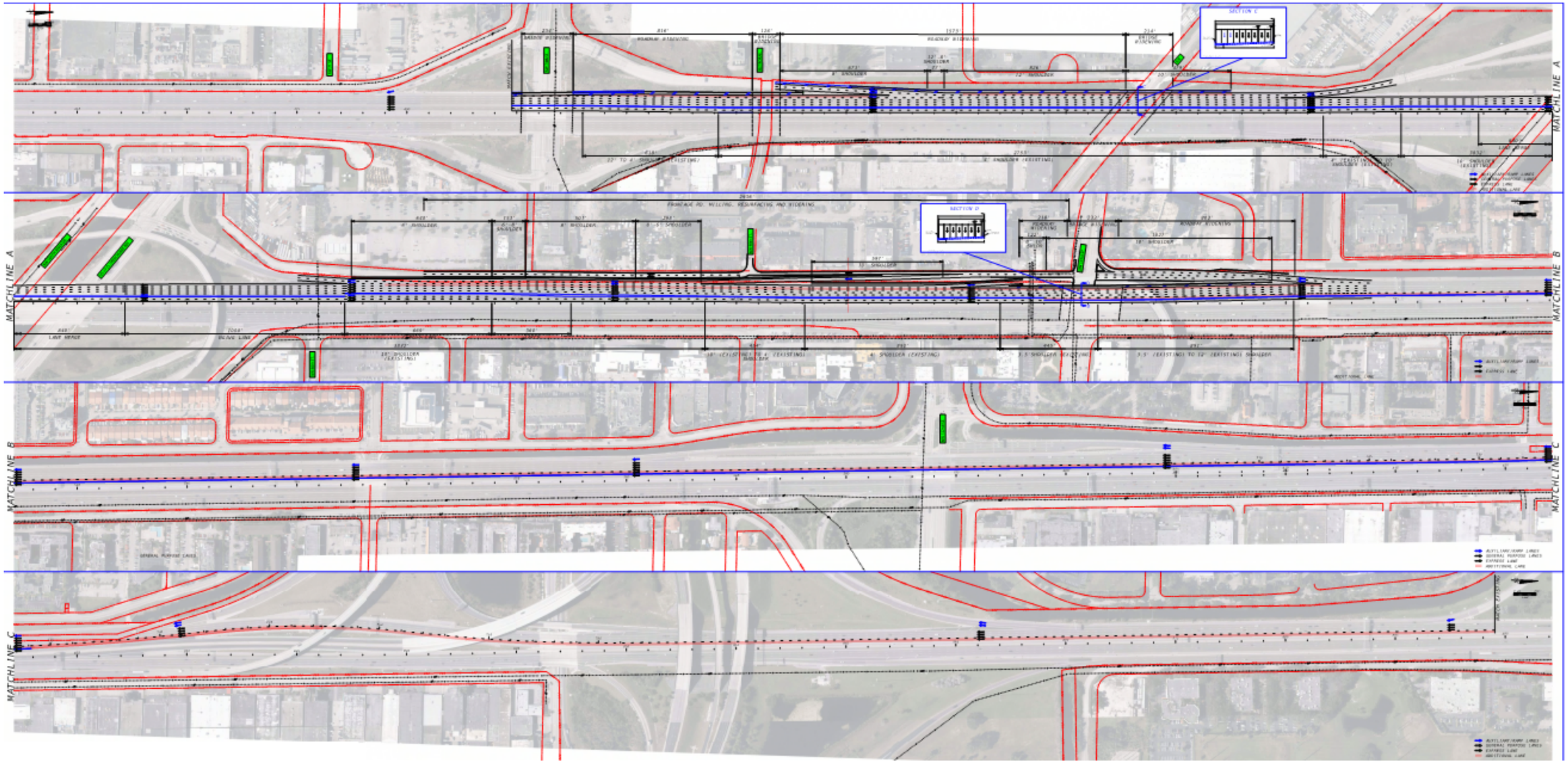
The primary purpose of the 441830-1-52-01 and 441831-1-52-01 RRR Projects is to preserve and extend the service life of the existing pavement. The following improvements are recommended to be included in the overall project scope of work to correct the deficient pavement conditions, meet ADA compliance, upgrade all sub-standard ground-mounted signs and pavement markings, upgrade existing guardrail, construction of new paved shoulders to meet required criteria and improve overall safety of the corridor, and upgrade existing bridge railings at Bridges 870569 and 870570.

Specifically the roadway scope entails milling and resurfacing of the existing pavement with adjustment of the existing storm drain manhole tops, utility manhole tops, and utility valves within the limits of resurfacing; Construction of paved shoulders (5 feet wide) in segments without existing roadside landscaping or utility impacts; Adjustment of the existing ditch-bottom inlets impacted by the proposed shoulder widening and construction of additional ditch-bottom inlets where required along the shoulder widening areas; Upgrade sub-standard pedestrian curb ramps and detectable warning surfaces along W 20th Avenue to meet ADA criteria; Construction of new sidewalk along W 20th Avenue to connect the gaps between existing sidewalk segments and reconstruction of damaged or uneven sidewalks; and upgrade of the guardrail, guardrail terminals, guardrail transition connections to the bridge traffic railings, and guardrail-to-rigid barrier transition connections.

Additionally, the proposed frontage road improvements include signing and pavement marking, signalization, landscaping, structure upgrades, upgrades to pedestrian signalization, crosswalk pavement markings, and lighting at intersections.

The proposed SR 826 southbound mainline widening and modification of the NW 103rd Street westbound flyover on-ramp to continue along SR 826 southbound will require the realignment of the west frontage road / NW 77th Avenue from approximately south of NW 98th Street intersection to south of the NW 103rd Street intersection.

Figure 4-1 | Build Alternative: SR 826 Southbound



4.3 Future Conditions Analysis

Analysis will be conducted for the following scenarios within the project limits:

- Existing (2019)
- Northbound Interim Improvements Build (2020)
- Palmetto Expressway Capacity Improvements Build (2023)

The analysis scenarios are described as follows:

- The Existing scenario represents the existing condition as it was after the opening of the SR 826 Express Lanes in the Fall of 2019 and will be used for developing and calibrating a baseline scenario.
- The Northbound Interim Improvements (FPID 432687-1-52-02) Build scenario is the roadway configuration which opened to traffic in the Fall of 2020. This specifically includes the combining of the Northwest 36th Street NB ingress with the Okeechobee Road NB ingress and shifting the NW 154th Street egress south to NW 103rd Street.
- The Palmetto Expressway Capacity Improvements (FPID 447165-1-52-01) Build scenario is the roadway configuration that is anticipated to open to traffic in the year 2023. This specifically includes all changes from FPID 432687-1-52-02, plus the shifting of the NW 154th Street SB ingress south to W 122nd Street.

For all three scenarios, one set of volumes will be used that was developed based on data supplied by FDOT that represented conditions in the Fall of 2019. Due to current extraordinary circumstances, additional data collection is not possible and sufficient turning movement count information is not available along the crossroads. The demand volumes from 2019 best represent worst case congestion for both 2019 and 2020. It is assumed that traffic conditions will not return to typical congested states until the pandemic and its impacts have subsided, therefore the same data set will be used for the Palmetto Expressway Capacity Improvements Build (2023) scenario.

Please see the Traffic Analysis Methodology Report, Calibration Report, and Traffic Operations Analysis Summary Report for more information.

4.3.1 Build 2023(2040) Peak Hour Traffic Development

A summary of the SR-826 travel speeds during the entire weekday morning and afternoon peak periods for the Palmetto Expressway Capacity Improvement Build scenario is provided in the Traffic Operations Analysis Summary Report. While there will be minor degradations in peak hour level of service with some sections dropping, all sections within the construction improvement area will meet the criteria of no LOS degradation and the average traveling speed throughout the corridor does improve.

It should be noted that this improved traffic flow, compared to existing conditions, is also reflective of increased traffic volumes compared to existing conditions. As stated previously, the existing

capacity of the SR-826 corridor in this area is inadequate to meet the existing demand. Unmet traffic demand, which cannot be accommodated due to inadequate system capacity results in backups along the corridor under 2019 Existing Conditions, which are expected to improve with the Palmetto Expressway Capacity Improvement project, as detailed above. This Build condition can accommodate increased traffic volumes and minimize the unmet demand compared to existing conditions.

4.4 Evaluation and Elimination of Alternatives

The alternatives matrix is developed to compare the alternatives across the breadth of issues affected by the project. It provides a comparative qualitative and quantitative analysis of alternatives for the project. An evaluation matrix, as shown in **Table 4-1**, was developed to help summarize and compare the impacts associated with each alternative.

Table 4-1 | Alternative Comparison Matrix

SR 826/Palmetto Expressway Alternatives Comparison Matrix		
EVALUATION FACTORS	**NO-BUILD ALTERNATIVE**	**ALT 1 - BUILD ALTERNATIVE**
Meets Purpose and Need	No	Yes
Project Cost ($ in millions)		
Construction Cost	$0	$37.9 million
Construction Engineering and Inspection (CEI)	$0	$3.8 million
Social and Economic Environment		
Number of Impacted Parcels (Business/Residential)	None	None
Number of Relocations (Business/Residential)	None	None
Right of Way Impacts	None	The project will not displace any residences or businesses within the community.
Social and Neighborhood Impacts	No change	There are no anticipated impacts to existing accessways or routes. Improved sidewalk coverage on the frontage road system will enhance the social environment through neighborhood connectivity.
Economic Impacts	No change	The project supports economic development by improving access to businesses through reduced congestion and improved facilities along the frontage road network.
Land Use Impacts	No change	No impacts or changes to land use are anticipated by the project.
Mobility Impacts	No change	The project improves mobility by providing an additional southbound GP lane and enhanced EL access. Continous sidewalk coverage on the frontage roads will enhance pedestrian and bicycle safety.
Aesthetic Impacts	No change	Viewshed impacts are expected to be limited since the expressway is an existing facility.
Community Services and Features Impacts	No change	No impacts to community services (Fire, Police, Hospitals, Churches, Schools, etc.) are anticipated from the project.
Cultural Environment		
Cultural/Historic/Archeological Impacts	No impact	The project will have no adverse affect on 2 archeological resources in the area. The 2 National Register-eligible historic resources in the area will not be adversely affected by the project.
Parks and Recreational Areas Impacts	No impact	Due to the distance of the improvements from the 9 recrecational areas within 0.25 miles of the corridor, no impacts to these recreational areas will occur as a result of the project.

SR 826/Palmetto Expressway Alternatives Comparison Matrix

EVALUATION FACTORS	NO-BUILD ALTERNATIVE	ALT 1 - BUILD ALTERNATIVE
Natural Environment		
Wetlands and Surface Waters Impacts	No change	No impacts to vegetated wetland resources will occur. 0.005 acres of impact to 1 excavated stormwater conveyance feature will occur. The impact will be compensated through the expansion of the drainage feature by approximately 565.4 square feet just to the south of the area of the impact.
Protected Species and Habitat Impacts	No Impact	The finding for the project on the West Indian manatee and on the eastern indigo snake is May Affect, Not Likely to Adversely Affect. The project will not adversely affect any federal or state-designated Critical Habitat.
Essential Fish Habitat Impacts	No impact	There is no Essential Fish Habitat located within the project area.
Water Quality and Water Quantity Impacts	No change	No adverse impacts to the Biscayne Aquifer are anticipated as a result of the project.
Floodplains Impacts	No impact	The project is located within the 100 year floodplain; it will not encroach upon the base floodplain.
Physical Environment		
Contamination/Hazardous Waste Sites	No change	5 High-Risk Sites 3 Medium-Risk Sites 22 Low-Risk Sites 2 No-Risk Sites
Traffic Noise	Minimal potential impacts may occur from increased congestion. Does not add any noise abatement.	Noise sensitive sites (416 residences and 5 non-residential) will be impacted by the improvements. Of the 9 noise barrier locations evaluated for mitigation, none (0) are recommended for the project.
Air Quality	The project is located within an attainment area. Minimal potential impacts may occur from increased congestion.	The project is located within an attainment area. No significant air quality impacts are anticipated. Project is anticipated to decrease congestion.
Utilities and Railroads	No change	The project will require water and sewer manhole adjustments and power pole relocations. The bridge widening over the FEC Railroad will not have an adverse impact on the railroad.
Construction	No impact	Construction activities causing dust will be minimized by adherence to applicable state regulations and specifications.
Traffic Operations		
AM Level of Service (LOS)	F	F/E (depending on segment)
PM Level of Service (LOS)	F	F/E (depending on segment)

5.0 Public Involvement/Project Coordination

The public information team is currently engaged in coordination efforts for the January 2021 hybrid Public Hearing. Notifications to Elected Officials and the public are anticipated to be distributed in mid to late December prior to the meeting. The tentative date for this hearing is January 12, 2021.

5.1 MPO Coordination

The public information team coordinated with the Miami-Dade County Transportation Planning Organization (TPO) Board Members and Miami-Dade County to conduct a bus tour of the project, hosted by FDOT. This bus tour was conducted on December 2, 2020.

5.2 Coordination with Elected/Appointed Officials

Notifications to Elected and Appointed Officials occurred prior to the tour and will occur prior to the Public Hearing.

5.3 Public Hearing

A public hearing will be held for this project. It is anticipated to be a hybrid public hearing to be held on Tuesday, January 12, 2021.

6.0 Preferred Alternative

The Preferred Alternative is Build Alternative. The Build Alternative consists of improvements in the southbound direction to retrofit the EL ingress/egress access points and widening to add a General Purpose lane from the exit to NW 103rd Street to the exit to Okeechobee Road. Other improvements include widening in the northbound direction to correct substandard shoulder width created under the Northbound Express Lanes Interim Improvements project, widening of the NW 103rd St on/off ramps, and a comprehensive milling and resurfacing plan. Furthermore, improvements include the installation of a new Tolling Site along both the northbound and southbound directions that will require a specific pavement design to be implemented 50 feet north/south of the gantry location. A detailed description of the development of the Preferred Alternative is included in subsequent sections of this report.

The preferred alternative will improve the frontage road system on both sides of SR 826 between US 27 and NW 122nd Street to correct deficient pavement conditions; upgrade sub-standard ground-mounted signs and pavement markings; comply with the American with Disabilities Act (ADA); replace existing guardrail; upgrade bridge railings; and construct new paved shoulders to meet criteria and improve overall safety of the corridor. Additionally, the proposed frontage road improvements include signalization, lighting, and landscaping upgrades.

The proposed SR 826 southbound mainline widening and the modification of the pier of the NW 103rd Street westbound flyover on-ramp to SR 826 southbound will require the realignment of the West

Frontage Road/NW 77th Avenue. The realignment of this two-way frontage road begins south of the NW 98th Street intersection and ends south of the NW 103rd Street intersection.

6.1 Right-of-Way Needs and Relocation

The proposed improvements of the Preferred Alternative will all be constructed within existing Right-of-Way.

6.2 Typical Sections

The proposed SR 826/Palmetto Expressway southbound typical section consists of a single express lane (11') and five general purpose lanes (11' each) from I-75 Interchange to NW 103rd Street interchange and two express lanes (11' each) and four general purpose lanes (11' each) from NW 103rd Street interchange to north of NW 36th Street interchange. See **Figure 6-2** and **Figure 6-3**.

There are no changes to the typical section along the SR 826/Palmetto Expressway northbound other than the provision of a wider inside shoulder at the NW 103rd Street interchange. See **Figure 6-4**.

The proposed typical section for the frontage road consists of two lanes (11'-12' each), flush paved shoulders (0'-5' each), and a sidewalk (0'-6') on one side. A representative typical section is illustrated in **Figure 6-5** and the entire Typical Section Package can be found in **Appendix B**.

Figure 6-1 | Typical Section: SR 826 Southbound One Express Lane

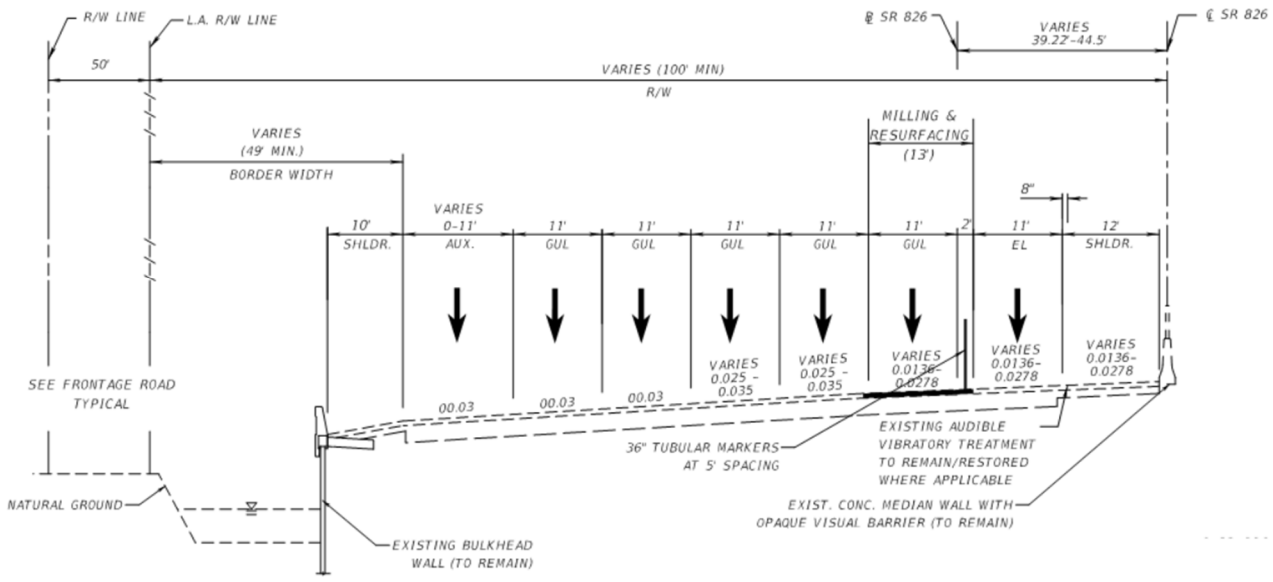


Figure 6-2 | Typical Section: SR 826 Southbound Two Express Lanes

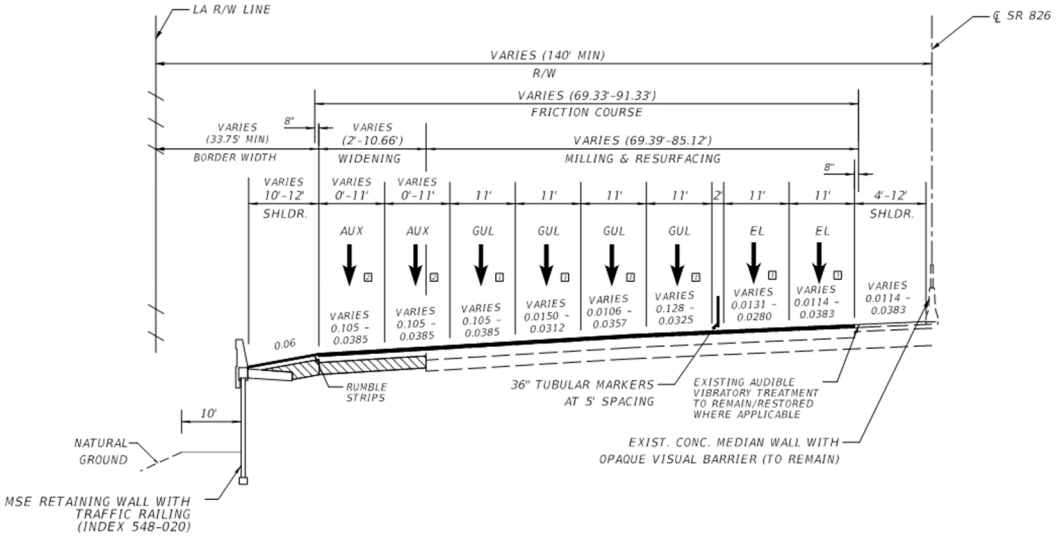


Figure 6-3 | Typical Section: SR 826 Northbound

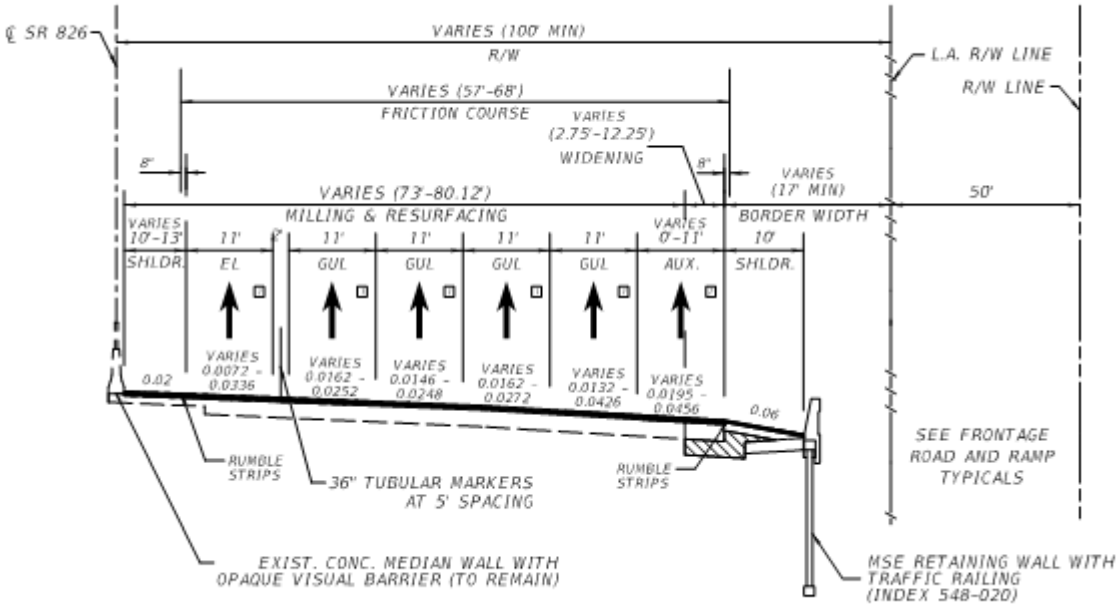
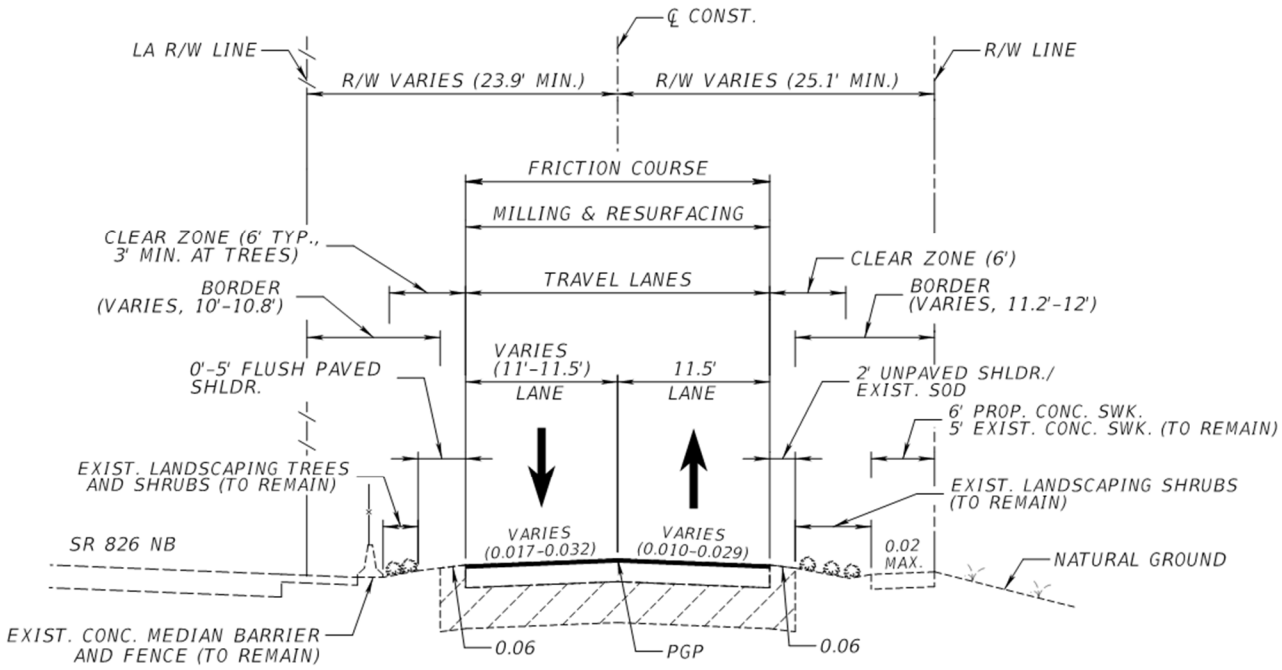


Figure 6-4 | Typical Section: Frontage Roads



6.3 Horizontal and Vertical Geometry

Once the preferred alternative was determined, the project team worked to further refine the horizontal and vertical geometry of the proposed improvements along the SR 826 mainline and the east and west frontage roads.

6.3.1 SR 826

The horizontal geometry of the Preferred Alternative along the SR 826 mainline allows for widening in critical areas within the project limits to improve the overall operation and safety. The Preferred Alternative along SR 826 mainline maintains the existing profile along all travel lanes. Details of the horizontal and vertical geometry are summarized in **Table 6-1**.

Table 6-1 | Geometry: SR 826

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01				
Design Element		**SR 826 (mainline)**	**Controlling Criteria**	
Functional Classification		Interstate	Interstate	
Design Speed (mph):		60	60	
Lane Width:		11'	12'	2021 FDM Table 210.2.1
Shoulder Width: Full (Paved)	Outside	10'-12'	12'	2021 FDM Table 211.4.1
	Median	3.5'-12'	12'	2021 FDM Table 211.4.1
Express Lane Buffer Width:		2'	4'	2021 FDM Section 211.3.3
Border Width:		10' from back of Barrier or Retaining Wall	10' from back of Barrier or Retaining Wall	2021 FDM Section 211.6.1
Horizontal Alignment:				
Max deflections in alignment withouth a curve:		0°45'00"	0°45'00"	2021 FDM Section 211.7.1
Length of Curve - Desirable (Minimum):		410.76'	1800' (900')	2021 FDM Table 211.7.1
Min. Radius:				
	e_{max} = 10%	N/A	1146'	2021 FDM Table 210.9.1
	N.C	18000'	11709'	2021 FDM Table 210.9.1
Max Superelevation:		NC	10%	2021 FDM Section 211.8
Superelevation Transition Rate:		N/A	1:170	2021 FDM Table 210.9.3
Vertical Alignment:				
Maximum Grades:		N/A	3%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:		N/A	0.40%	2021 FDM Table 210.10.2
Minimum Profile Grade		N/A	0.50%	2021 FDM Section 210.9.1
Min. Curve Length:	Crest:	N/A	1000'	2021 FDM Table 211.9.3
	Sag:	N/A	800'	2021 FDM Table 211.9.3
K-Value:	Crest:	N/A	193	2021 FDM Table 211.9.2
	Sag:	N/A	157	2021 FDM Table 211.9.2
Horizontal Clear Zone - Mainline (Aux. Lanes):		N/A	36' (24')	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		N/A	820'	2021 FDM Table 211.10.1
Cross slope:				
First 2 lanes:			2%	2021 FDM Figure 211.2.1
Next 2 lanes:			3%	2021 FDM Figure 211.2.1
More than 4 Lanes:			3.5%	2021 FDM Figure 211.2.1
Vertical Clearance:				
Over Roadways:		16'	16'	2021 FDM Table 260.6.1
Overhead Sign Structures:		17'-6"	17'-6"	2021 FDM Section 210.10.3
Overhead DMS Sign Trusses:		19'-6"	19'-6"	2021 FDM Section 210.10.3
Signals, mast arms, or other structures		17'-6"	17'-6"	2021 FDM Section 210.10.3
R/R		18.78	23.5'	2021 FDM Table 260.6.1
Base Clearance:		3'	3'	2021 FDM Section 210.10.3

6.3.2 Ramps

In order to accommodate the mainline improvements, the preferred alternative requires adjustments to the geometry of five ramps within the project limits.

6.3.2.1 Ramp A – SR 826 SB Off-Ramp at NW 74th Street

The preferred alternative includes horizontal realignment of Ramp A to accommodate mainline widening. Details of the horizontal and vertical geometry are summarized in **Table 6-2**.

Table 6-2 | Geometry: Ramp A

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01				
Design Element		**Freeway Ramps (2 Lanes) (40 MPH)**	**Controlling Criteria**	
Functional Classification		Interstate - Ramp		
Design Speed (mph):		40		
Lane Width:		12'	12'	2021 FDM Table 211.2.1
Shoulder Width: Full (Paved)	Outside	8'	10'	2021 FDM Table 211.4.1
	Median	6'	8'	2021 FDM Table 211.4.1
Border Width:		10' from back of Barrier or Retaining Wall	10' from back of Barrier or Retaining Wall	2021 FDM Table 211.6.1
Horizontal Alignment:				
Max deflections in alignment withouth a curve:		2°00'00"	2°00'00"	2021 FDM Table 211.7.1
Length of Curve - Desirable (Minimum):		N/A	600' (400')	2021 FDM Table 211.7.1
Min. Radius:				
	e_{max} = 10%	N/A	441'	2021 FDM Table 210.9.1
	N.C	N/A	5560'	2021 FDM Table 210.9.1
Max Superelevation:		NC	10%	2021 FDM Table 211.8
Superelevation Transition Rate:		N/A	1:175	2021 FDM Table 210.9.3
Vertical Alignment:				
Maximum Grades:		N/A	6%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:		N/A	0.80%	2021 FDM Table 210.10.2
Min. Curve Length:	Crest:	N/A	120'	2021 FDM Table 211.9.3
	Sag:	N/A	120'	2021 FDM Table 211.9.3
K-Value:	Crest:	N/A	44	2021 FDM Table 211.9.2
	Sag:	N/A	64	2021 FDM Table 211.9.2
Horizontal Clear Zone Width:		N/A	10'	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		N/A	305'	2021 FDM Table 211.10.2

6.3.2.2 Ramp B – SR 826 SB Off-Ramp at NW 103rd Street

The preferred alternative includes Vertical realignment of Ramp B to accommodate mainline widening and gore relocation. Details of the horizontal and vertical geometry are summarized in **Table 6-3**.

Table 6-3 | Geometry: Ramp B

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01				
Design Element		**Freeway Ramps (2-4 Lanes) (40 MPH)**	**Controlling Criteria**	
Functional Classification		Interstate - Ramp		
Design Speed (mph):		40		
Lane Width:		12'	12'	2021 FDM Table 211.2.1
Shoulder Width: Full (Paved)	Outside	10'	10'	2021 FDM Table 211.4.1
	Median	6'	8'	2021 FDM Table 211.4.1
Border Width:		10' from back of Barrier or Retaining Wall	10' from back of Barrier or Retaining Wall	2021 FDM Table 211.6.1
Horizontal Alignment:				
Max deflections in alignment withouth a curve:		2°00'00"	2°00'00"	2021 FDM Table 211.7.1
Length of Curve - Desirable (Minimum):		484.4'	600' (400')	2021 FDM Table 211.7.1
Min. Radius:				
	e_{max} = 10%		441'	2021 FDM Table 210.9.1
	N.C	5754'	5560'	2021 FDM Table 210.9.1
Max Superelevation:		NC	10%	2021 FDM Table 211.8
Superelevation Transition Rate:			1:175	2021 FDM Table 210.9.3
Vertical Alignment:				
Maximum Grades:		3.7%	6%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:			0.80%	2021 FDM Table 210.10.2
Min. Curve Length:	Crest:	420'	120'	2021 FDM Table 211.9.3
	Sag:	N/A	120'	2021 FDM Table 211.9.3
K-Value:	Crest:	71	44	2021 FDM Table 211.9.2
	Sag:	N/A	64	2021 FDM Table 211.9.2
Horizontal Clear Zone Width:		N/A	10'	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		N/A	305'	2021 FDM Table 211.10.2

6.3.2.3 Ramp C – NW 77th Avenue On-Ramp

The preferred alternative includes horizontal realignment of Ramp C to accommodate mainline widening. Details of the horizontal and vertical geometry are summarized in **Table 6-4**.

Table 6-4 | Geometry: Ramp C

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01				
Design Element		**Freeway Ramps (1 Lane) (40 MPH)**	**Controlling Criteria**	
Functional Classification		Interstate - Ramp		
Design Speed (mph):		40		
Lane Width:		12'	12'	2021 FDM Table 211.2.1
Shoulder Width: Full (Paved)	Outside	6'	10'	2021 FDM Table 211.4.1
	Median	6'	8'	2021 FDM Table 211.4.1
Border Width:		10' from back of Barrier or Retaining Wall	10' from back of Barrier or Retaining Wall	2021 FDM Table 211.6.1
Horizontal Alignment:				
Max deflections in alignment withouth a curve:		2°00'00"	2°00'00"	2021 FDM Table 211.7.1
Length of Curve - Desirable (Minimum):		319'	600' (400')	2021 FDM Table 211.7.1
Min. Radius:				
	e_{max} = 10%		441'	2021 FDM Table 210.9.1
	N.C	5575'	5560'	2021 FDM Table 210.9.1
Max Superelevation:		N/A	10%	2021 FDM Table 211.8
Superelevation Transition Rate:		N/A	1:175	2021 FDM Table 210.9.3
Vertical Alignment:				
Maximum Grades:		1.5%	6%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:		N/A	0.80%	2021 FDM Table 210.10.2
Min. Curve Length:	Crest:	200'	120'	2021 FDM Table 211.9.3
	Sag:	170'	120'	2021 FDM Table 211.9.3
K-Value:	Crest:	80	44	2021 FDM Table 211.9.2
	Sag:	83	64	2021 FDM Table 211.9.2
Horizontal Clear Zone Width:		N/A	10'	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		N/A	305'	2021 FDM Table 211.10.2

6.3.2.4 Ramp D – NW 103rd SB Flyover On-Ramp

The preferred alternative includes horizontal realignment of Ramp D due to deck width reduction in order to accommodate mainline widening. Details of the horizontal and vertical geometry are summarized in **Table 6-5**.

Table 6-5 | Geometry: Ramp D

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01				
Design Element		**Freeway Ramps (1-2 Lanes) (30 MPH)**	**Controlling Criteria**	
Functional Classification		Interstate - Ramp		
Design Speed (mph):		40		
Lane Width:		12-15'	12-15'	2021 FDM Table 211.2.1
Shoulder Width: Full (Paved)	Outside	6'-10'	6'	2021 FDM Table 211.4.1
	Median	6'-13'	6'	2021 FDM Table 211.4.1
Border Width:		10' from back of Barrier or Retaining Wall	10' from back of Barrier or Retaining Wall	2021 FDM Table 211.6.1
Horizontal Alignment:				
Max deflections in alignment withouth a curve:		2°00'00"	2°00'00"	2021 FDM Table 211.7.1
Length of Curve - Desirable (Minimum):		436'	450' (400')	2021 FDM Table 211.7.1
Min. Radius:				
	e_{max} = 10%	326'	239'	2021 FDM Table 210.9.1
	N.C		3349'	2021 FDM Table 210.9.1
Max Superelevation:		9.7%	10%	2021 FDM Table 211.8
Superelevation Transition Rate:			1:175	2021 FDM Table 210.9.3
Vertical Alignment:				
Maximum Grades:		N/A	7%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:		N/A	1.00%	2021 FDM Table 210.10.2
Min. Curve Length:	Crest:	N/A	90'	2021 FDM Table 211.9.3
	Sag:	N/A	90'	2021 FDM Table 211.9.3
K-Value:	Crest:	N/A	19	2021 FDM Table 211.9.2
	Sag:	N/A	37	2021 FDM Table 211.9.2
Horizontal Clear Zone Width:		N/A	10'	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		222.17'	200'	2021 FDM Table 211.10.2
Vertical Clearance:				
Over Roadways:		N/A	16'	2021 FDM Table 260.6.1

6.3.2.5 Ramp E – NW 103rd Street NB Off-Ramp

The preferred alternative includes horizontal realignment of Ramp E to accommodate shoulder width increase, the proposed improvements also include a raise in the vertical profile of the ramp. Details of the horizontal and vertical geometry are summarized in **Table 6-6**.

Table 6-6 | Geometry: Ramp E

SR 826/Palmetto Expressway Capacity Improvements from South of NW 36th Street to NW 154th Street FPID: 447165-1-52-01				
Design Element		**Freeway Ramps (2 Lanes) (40 MPH)**	**Controlling Criteria**	
Functional Classification		Interstate - Ramp		
Design Speed (mph):		40		
Lane Width:		12'	12'	2021 FDM Table 211.2.1
Shoulder Width: Full (Paved)	Outside	7.9'-10'	10'	2021 FDM Table 211.4.1
	Median	6'	8'	2021 FDM Table 211.4.1
Border Width:		3.75' MIN	10' from back of Barrier or Retaining Wall	2021 FDM Table 211.6.1
Horizontal Alignment:				
Max deflections in alignment withouth a curve:		2°00'00"	2°00'00"	2021 FDM Table 211.7.1
Length of Curve - Desirable (Minimum):		214'	600' (400')	2021 FDM Table 211.7.1
Min. Radius:				
e_{max} = 10%			441'	2021 FDM Table 210.9.1
N.C		6012	5560'	2021 FDM Table 210.9.1
Max Superelevation:		NC	10%	2021 FDM Table 211.8
Superelevation Transition Rate:			1:175	2021 FDM Table 210.9.3
Vertical Alignment:				
Maximum Grades:		3.9%	6%	2021 FDM Table 211.9.1
Maximum change in grade withouth Vertical Curve:		N/A	0.80%	2021 FDM Table 210.10.2
Min. Curve Length:	Crest:	460'	120'	2021 FDM Table 211.9.3
	Sag:	N/A	120'	2021 FDM Table 211.9.3
K-Value:	Crest:	71	44	2021 FDM Table 211.9.2
	Sag:	N/A	64	2021 FDM Table 211.9.2
Horizontal Clear Zone Width:		N/A	10'	2021 FDM Table 215.2.1
Minimum Stopping Sight Distance (grades < 2%):		N/A	305'	2021 FDM Table 211.10.2

6.3.3 Frontage Roads

The preferred alternative improvements for the frontage roads consist of pavement milling and resurfacing, shoulder widening, and upgrades to drainage systems and pedestrian facilities in order to preserve and extend the life of the project. Details of the horizontal and vertical geometry are summarized in **Table 6-7**.

Table 6-7 | Geometry: Frontage Roads

SR 826 Frontage Roads from Okeechobee Road to NW 103 Street (FPID 441830-1-52-01) and SR 826 Frontage Roads from NW 103 Street to NW 122 Street (FPID 441831-1-52-01)							
Design Element			**W 20 Ave.** (87260151)	**NW 77 Ave.** (87260152)	**W 20 Ave. East** (87260298)	**NW 77 Ct.** (87260506)	**W 20 Ave West** (87260521)
Functional Classification			Urban Local	Urban Local	Urban Local	Urban Local	Urban Local
Design Speed (mph):			30 mph	30 mph	30 mph	30 mph	35 mph
Lane Width:		Travel Lanes	11'-12'	11'-12'	11'-12'	11'-12'	11'-12'
		Auxiliary Lanes	N/A	11'-15'	10.5'-15'	11'	10'-12'
Cross Slope:	Travel Lanes	Min.	0.009	0.004	0.004	0.005	0.000
		Max.	0.043	0.047	0.045	0.033	0.033
	Outside Shoulder	Min.	0.060	0.060	0.060	N/A	0.060
		Max.					
	Inside Shoulder	Min.	N/A	0.016	0.037	N/A	N/A
		Max.		0.066	0.065		
Median Width			N/A	N/A	16'	N/A	N/A
Shoulder Width:	Outside Shoulder	Full Width	2'-6'	0'-10'	0'-6'	N/A	0'-6'
		Paved Width	0'-2'	0'-10'	0'-5'	N/A	0'-5'
	Inside Shoulder	Full Width	N/A	2'-6'	6'	N/A	N/A
		Paved Width	N/A	1'-5'	2'	N/A	N/A
Border Width:			0'-46.7'	0'-22'	0'-24'	8'-13'	6'-8'
Horizontal Alignment:							
Max. deflections in alignment without a curve:			Max. 0°53'58"	Max. 2°00'00"	Max. 1°09'57"	N/A	Max. 0°46'31"
Length of Horizontal Curve			Min. 56.16'	Min. 111.35'	Min. 111.59'	Min. 75.06'	Min. 114.87'
Min. Radius:			Min. 72'	Min. 175'	Min. 76'	Min. 47'	Min. 75'
Max Superelevation:			0.086	0.080	0.070	RC	0.100
Vertical Alignment:							
Max. change in grade without Vertical Curve:			N/A	0.504%	N/A	N/A	N/A
Min. distance between VPIs on curbed roadways			N/A	50'	N/A	N/A	N/A
Min. grade on curbed roadways			N/A	0.20%	N/A	N/A	N/A
K-Value:		Crest:	N/A	N/A	N/A	N/A	N/A
		Sag:	N/A	128	N/A	N/A	N/A
Min. Curve Length:		Crest/Sag:	N/A	120	N/A	N/A	N/A
Vertical Clearance:							
Signals, mast arms, or other structures			N/A	N/A	17'	N/A	17'
Bridges over Roadways:			N/A	17'-11"	N/A	40+'	N/A
Min. Stopping Sight Distance: (Grades < 2%)			121'	149'	115'	109'	149'
Clear Zone: (flush shoulder section)	**RRR**	Travel Lanes & Auxiliary Lanes	Min. 3'	6'	Min. 4'	N/A	6'
	Control Zone	Travel Lanes	Min. 3'	12'	Min. 2'	N/A	14'
		Auxiliary Lanes	N/A	10'	10'	N/A	10'
Min. Lateral Offset: (curb & gutter section)	Light Poles, Signal Poles, ITS Poles, Trees		1.5'	1.5'	1.5'	1.5'	1.5'
	Bridge Piers & Abutments		N/A	8.4'	8.7'	N/A	N/A
Sidewalk Width:		Existing	5'	N/A	5'	6'-8.5'	5'
		Proposed	4'-6'		4.7'-6'	4.2'-6'	6'
Bicycle Facilities:			0'-2'	0'-10'	0'-5'	N/A	0'-5'
Bridge Width:			N/A	N/A	6' shoulder	N/A	1'-4" shoulder

6.4 Access Management

Access management throughout the study limits will remain the same.

6.5 Design Variations and Exceptions

Design variations and exceptions necessary for the Preferred Alternative, both along SR 826 and the frontage roads include the following:

6.5.1 Design Variations

SR 826:

- Barrier Mounted Fence
  - The locations where the proposed fence is being mounted on top of new concrete barrier wall is from Sta. 497+94.98 to Sta. 503+99.49, and from Sta. 511+10.67 to Sta. 520+98.39. The proposed fence mounted on top of the new concrete barrier wall is a non-crash tested continuous item and does not meet the minimum offset to hazard above top of barrier wall requirement.
- Border Width
  - The NB off ramp to NW 103rd Street is proposed with border width less than the 8-foot FDOT requires for curbed roadway and existing border with of less than 10-feet for existing wall to remain.
- Buffer Width
  - The buffer width throughout the project will be maintained at 2-feet, which is less than the current criteria of 4-feet. The 2-feet buffer width is consistent with the remainder of the corridor.
- Cross Slope
  - Throughout the project, no changes will be made to the existing cross slope. The widening will match adjacent lane cross slope.
- Recovery Area
  - There is one location within the project limits where a 360 feet escape taper or recovery area, as required per Standard Index 525, is not provided for an exit ramp. As such, a design variation is required for the SB exit ramp to NW 103rd Street.
- Weaving Distance
  - There is one location within the project limits where there the proposed design provides the required 1000 feet per lane change through the weaving section between the SB EL egress and the SB off-ramp at NW 74th Street, for a total of 4000 feet. However due to space constraints, the additional 1500 feet intended to allow traffic in the outside GP lane to access the exit ramp cannot be provided. Since not providing this additional 1500 feet does not comply with the current 2020 FDM criteria, a design variation is required.

Frontage Roads:

- Bicycle Facilities

  - The project limits include 22 segments where bicycle facilities are not proposed, due to the available existing pavement width or other roadside impacts.
- Border Width
  - The project limits include 27 segments with sub-standard Border Width less than FDOT and AASHTO minimum Border Width of 8.0 feet on existing roadways. Median Width
- Cross Slope
  - A Design Variation is required for 29 locations with existing sub-standard cross slopes less than 0.015 or greater than 0.030, in normal-crown segments outside the limits of superelevation transitions or intersection plateaus.
- Horizontal Curve Radius and Length
  - A Design Variation is being requested for 9 horizontal curves with sub-standard radius and 18 horizontal curves with sub-standard length. Some of the existing horizontal curves along the Frontage Roads near intersections were originally designed to meet a design speed of 25 mph or less and do not meet the current FDOT RRR criteria for minimum radius at the proposed design speeds of 30 mph or 35 mph. Most of the existing horizontal curves do not meet the FDOT minimum length of horizontal curve of 400 feet.
- Superelevation Rate
  - A Design Variation is being requested for 6 horizontal curves with sub-standard superelevation rate. Some of the existing horizontal curves along the Frontage Roads near intersections were originally designed to meet a design speed of 20 mph or less and do not meet the current FDOT criteria for superelevation rate at the proposed design speeds of 30 mph or 35 mph.
- Horizontal Stopping Sight Distance
  - A Design Variation is being requested for 6 horizontal curves with sub-standard stopping sight distance due to roadside objections at the right of way line. Some of the existing horizontal curves along the Frontage Roads were originally designed to meet a design speed of 20 mph or less and do not meet the current FDOT criteria for stopping sight distance at the proposed design speeds of 30 mph or 35 mph.
- Lane Width
  - The project limits include 19 locations with sub-standard lane widths, including travel lanes less than 12 feet wide in undivided two-lane sections and turn lanes less than 11 feet wide in divided sections.
- Lateral offset
  - The project limits include existing roadside objects located inside the clear zone; including 57 trees, 2 ITS poles, and 3 rock boulders.
- Shoulder Width
  - The project limits include 15 segments with sub-standard shoulder widths, either full-width shoulders less than 6 feet, paved shoulders less than 5 feet wide.
- Bridge Width
  - The project limits include two bridges with sub-standard bridge widths and outside shoulders less than 4.0 feet wide. At Bridge 870570, the existing shoulder widths are proposed to be reduced on LT & RT sides to provide a raised sidewalk (6’ wide) on the RT side while matching

the existing bridge deck width. At Bridge 870569, the existing LT shoulder width and lane width are proposed to be reduced to provide a raised sidewalk (4' wide) on the LT side while matching the existing bridge deck width.

- Guardrail Lateral Offset
  - The project limits include four segments with sub-standard guardrail lateral offset from the shoulder break point.
- Sidewalk Width
  - There are three locations with proposed new sidewalks less than 6 feet wide due to lack of available right of way.
- Sight Triangles
  - A Design Variation is being requested for 64 locations with existing obstructions to the clear sight triangle. The 14.5 foot required driver-eye setback encroaches outside the FDOT right of way at many existing driveways within the project limits where the distance to the right of way line is 14 feet or less from the travel lane and the fencing, landscaping, or walls on the private property create an obstruction to the clear sight distance.

6.5.2 Design Exceptions

SR 826:

- Lane Width
  - Exception for lane width consistent with the existing conditions within the PD&E study limits, 11-feet provided, 12-feet required.
- Shoulder Width
  - Exception for shoulder width consistent with the existing conditions within the PD&E study limits. Multiple locations in the southbound direction have existing shoulders less than the 10-feet required will be maintained by the project.
- Vertical Clearance
  - Exception for vertical clearance consistent with the existing conditions. The bridge widenings of the SR 826 mainline over the Metrorail and FEC Railroad will maintain the existing substandard vertical clearance.

6.6 Lighting

SR 826 southbound and northbound mainline and ramps existing conventional lighting assemblies with HPS luminaires are proposed to be replaced with LED luminaires throughout the widening of the mainline and proposed outside barrier walls due to the following reasons:

- The proposed roadway improvements will impact the locations of several light poles mounted on the outside barrier walls
- The existing median mounted conventional lighting system will not have the necessary intensity to illuminate the widened roadway segments from shoulder break to shoulder break

- HPS luminaires are obsolete, consume more energy and require more maintenance than the LED type

The proposed mainline and ramps conventional lighting assemblies will consist of FDOT standard aluminum light poles, single and double bracket arms and LED cobra head type luminaires. All proposed luminaires will be mounted with zero degrees tilt and will have zero up light (Full Cutoff) to minimize the sky glow (light pollution).

The existing conventional lighting assemblies with HPS luminaires at SR 826 Frontage Road/W 20th Avenue East and West at the intersections with NW 103rd Street and W 60th Street are proposed to be retrofitted with LED luminaires and additional lighting assemblies to be installed due to the following reasons:

- The proposed roadway improvements will change the overall layout/alignment at the intersections which will require the intersection lighting to be analyzed to ensure proper coverage
- Ensure that crosswalks are illuminated in accordance with current signalized intersection horizontal and vertical FDM lighting criteria to improve pedestrian safety
- HPS luminaires are obsolete, consume more energy and require more maintenance than the LED type

Underdeck lighting will be required to be analyzed due to the widening of SR 826 bridge over NW 103rd Street to ensure widen areas are properly illuminated. The existing underdeck lighting pendant mounted luminaires which are HPS will be replaced with more efficient and sustainable LED wall/pier cap mounted luminaires. Also, in accordance with the 2020 FDM the only luminaire to be used for underdeck lighting is wall mount fixture located on the pier or pier cap.

SR 826 Frontage Roads East and West which include, NW 77th Avenue, W 20th Avenue West, W 20th Avenue East (East Frontage Road) and W 67th Place roadway segments excluding the intersections at NW 103rd Street and W 60th Street conventional lighting assemblies with HPS luminaires impacted by the proposed shoulder widening and sidewalk construction are proposed to be replaced with LED luminaires due to the following reasons:

- The existing lighting assemblies on SR 826 west barrier wall adjacent and along NW 77th Avenue will be impacted by the widening of SR 826 southbound
- Four Concrete light poles, three along W 67th Place (West Frontage Road) and one at W 20th Avenue East will be impacted by the proposed sidewalk and shoulder lanes widening
- HPS luminaires are obsolete, consume more energy and require more maintenance than the LED type

6.7 Utilities

The Preferred Alternative will require the manhole adjustments for Miami Dade Water and Sewer District water and sewer manholes as well as the relocation of FPL Distribution poles.

6.8 Preliminary Drainage Analysis

For the allowable spread, design speed for the expressway is greater than 55 mile per hour (mph). Therefore, no encroachment is allowed in the travel lane. For Frontage Road, design speed is less than 45 mph; spread is allowed to encroach a ½ of lane.

In addition to the above standards, for sections with a shoulder gutter, the spread resulting from a 10-year frequency storm shall not exceed 1'-3" outside the gutter in the direction toward the front slope. The distance limits the spread to the face of guardrail posts.

The SR 826 project falls within the limits of the Community Panels 12086C0144L, 12086C0277L and 12086C0279L of the FEMA FIRM Maps of Miami-Dade County. The project is located within the Flood Zones AH, AE, and X. There is very negligible flood impact due to proposed improvements

6.8.1 Proposed Drainage Systems

The proposed drainage design consists of adjust the existing ditch-bottom inlets impacted by the proposed shoulder widening. Construct a drainage system with additional ditch-bottom inlets and French drains where required along the shoulder widening areas. It is noted that proposed storm sewer systems shall meet FDOT wall zone requirements however in some areas pipe running along MSE wall are shown to tie existing systems or avoid extensive pipe installations. These locations J-Bottom are proposed to offset pipe and meet wall strap requirement. Re-grade the sod at locations with existing ponding to improve the drainage pattern. All proposed stormwater management facilities will provide the necessary water quality treatment volume and limit the post-development peak discharge rate into the Little Canal to the pre-development peak discharge rate. Water quality treatment and discharge attenuation will be provided via existing trench drain and proposed French Drains. Additional French drain is being proposed where widening is proposed in the project in order to compensate for the additional impervious area along SR 826. The existing weirs in some of the basins will be modified in order to ensure that post-development discharge requirements are met for all receiving surface water bodies.

6.9 Structures

6.9.1 Horizontal and Vertical Clearance

The primary function of vertical clearance to structures going over roadways or railroads consists of providing safe passage to tall design vehicles and rail cars beneath these structures. The FDOT Florida Design Manual (FDM) specifies that the highest point on the roadway below a bridge structure must measure a minimum of 16.5-feet to the lowest point (low member) beneath the structure. This includes provisions for a future underpass resurfacing of 6 inches over the existing pavement elevation. The FDM also states to provide 23.5-ft of vertical clearance for Roadway or Pedestrian Bridge over Railroad, and 24.25-ft of vertical clearance for Roadway or Pedestrian bridge over Electrified Railroad. According to the Miami Dade Transit manual, vertical clearance, guideway structure under a fixed structure, shall be 13'-0" minimum, measured from top of rail to the nearest point of the obstruction.

AASHTO requires a minimum vertical clearance of 16-feet for structures passing over roadways including auxiliary lanes and the usable width of shoulders. Further guidance allows a minimum vertical clearance of 14-feet in highly urbanized areas provided there is an alternate facility with the minimum 16-feet clearance. For railroad underpasses, AASHTO recommends a minimum vertical clearance of 23-feet.

The vertical clearance for all the bridges along SR 826 over roadways meet the design criteria. The bridges over Metrorail and FEC will maintain the existing substandard vertical clearances.

The horizontal clearance underneath the existing bridges is the lateral distance from the roadway edge of travel lane to the bridge abutment or piers. The horizontal clearance requirements for most roadside features and objects are based on providing the required clear zone. Both the FDOT FDM and AASHTO require bridge piers and abutment walls to be placed outside the clear zone unless shielded by a crash worthy barrier.

The following sections provide descriptions of proposed modifications to the bridge structures. There are five (5) bridges throughout the corridor that have no modifications.

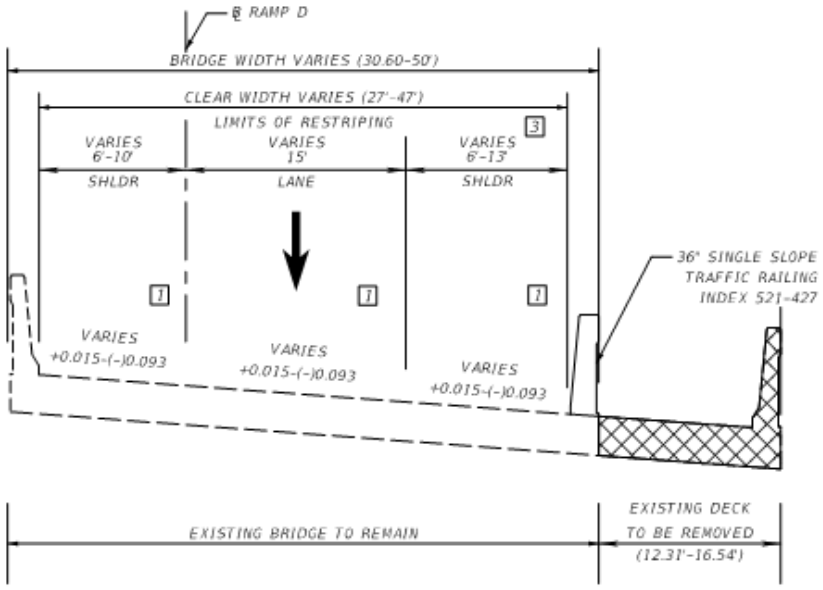
6.9.2 Flyover Bridge from SR 932/NW 103rd westbound to SR 826 southbound

6.9.2.1 Bridge Analysis

The proposed improvements require the bridge to be modified to accommodate the proposed new roadway typical section. Major modifications are necessary to pier 5 and modifications are necessary to both piers 2 and 3 as well as the existing bridge deck. Additionally, girder 5 will be removed with the bridge deck removal

Figure 6-5 shows the proposed bridge typical section for the flyover bridge.

Figure 6-5 | Typical Section: Flyover Bridge from SR 932/NW 103rd WB to SR 826 SB, Bridge No. 870856



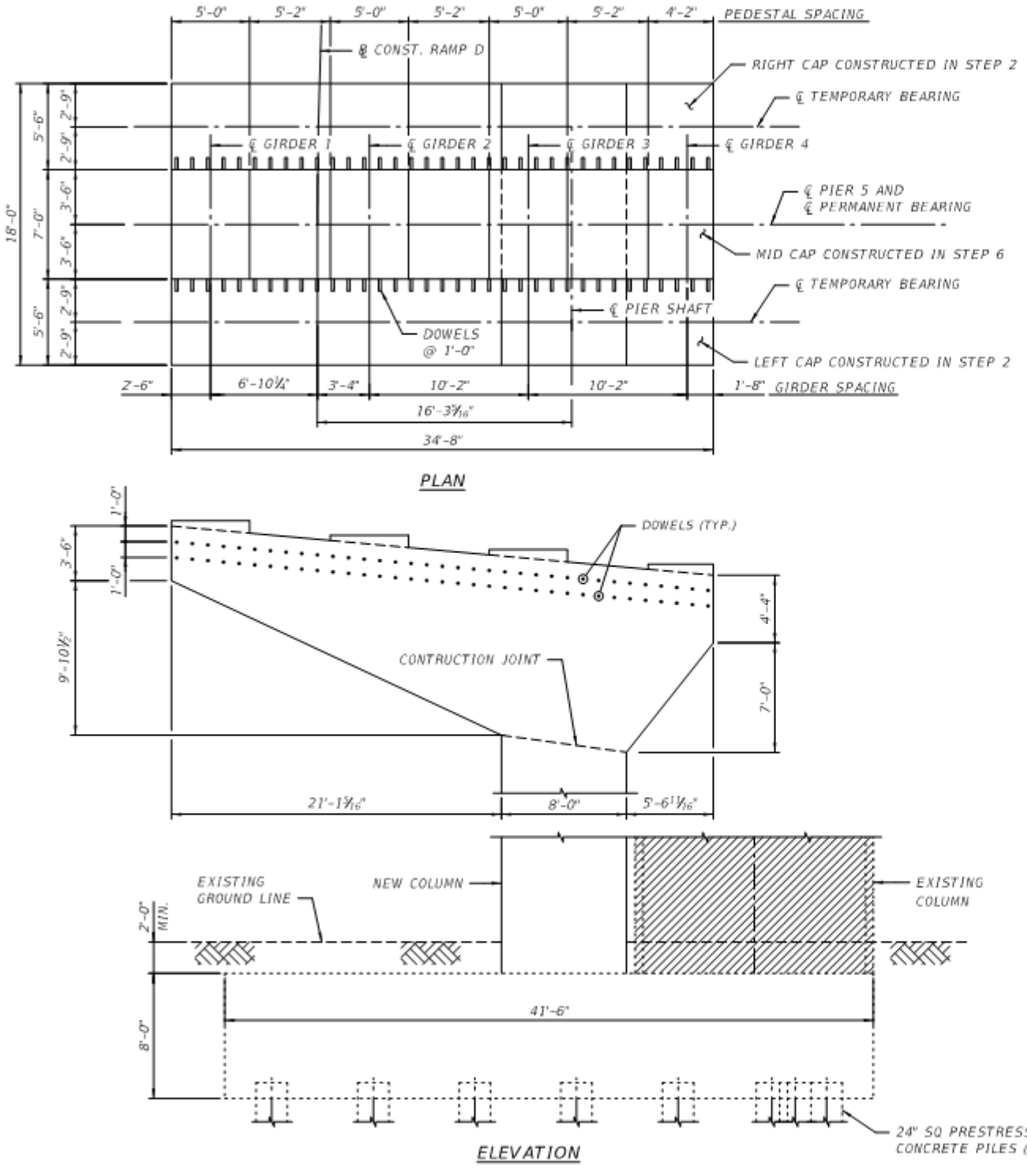
6.9.2.2 Construction Sequence

To construct the Pier 5 modifications, the steps below will be followed:

1. Construct new column in front of existing column.
2. Construct new right and left cap.
3. Construct integral cap with post-tensioning.
4. Shift loads to temporary bearings on new right and left cap.
5. Demolish existing column and cap.
6. Build new middle cap
7. Shift loads to permanent bearings on new middle cap.

The construction sequence is illustrated in **Figure 6-6.**

Figure 6-6 | Construction Sequence



CONSTRUCTION STEPS:

1. CONSTRUCT NEW COLUMN IN FRONT OF EXISTING COLUMN.
2. CONSTRUCT NEW RIGHT AND LEFT CAP.
3. CONSTRUCT INTEGRAL CAP WITH POST-TENSIONING.
4. SHIFT LOADS TO TEMPORARY BEARINGS ON NEW RIGHT AND LEFT CAP.
5. DEMOLISH EXISTING COLUMN AND CAP.
6. BUILD NEW MIDDLE CAP.
7. SHIFT LOADS TO PERMANENT BEARINGS ON NEW MIDDLE CAP.

LEGEND:

- EXISTING STRUCTURE TO BE REMOVED
- EXISTING STRUCTURE TO REMAIN
- NEW STRUCTURE

NOTES:

1. SHIFT EXISTING TRAFFIC TOWARD INSIDE.
2. MAINTAIN TRAFFIC ALL TIME EXCEPT FOR JACKING DURING OVERNIGHT CLOSURES AND DEMOLITION.
3. PROVIDE SHIM PLATES FOR TEMPORARY BEARINGS ON LEFT AND RIGHT CAP.
4. FOR INTERGRAL CAP DETAILS, SEE END OF DECK SECTION AT PIER 5.

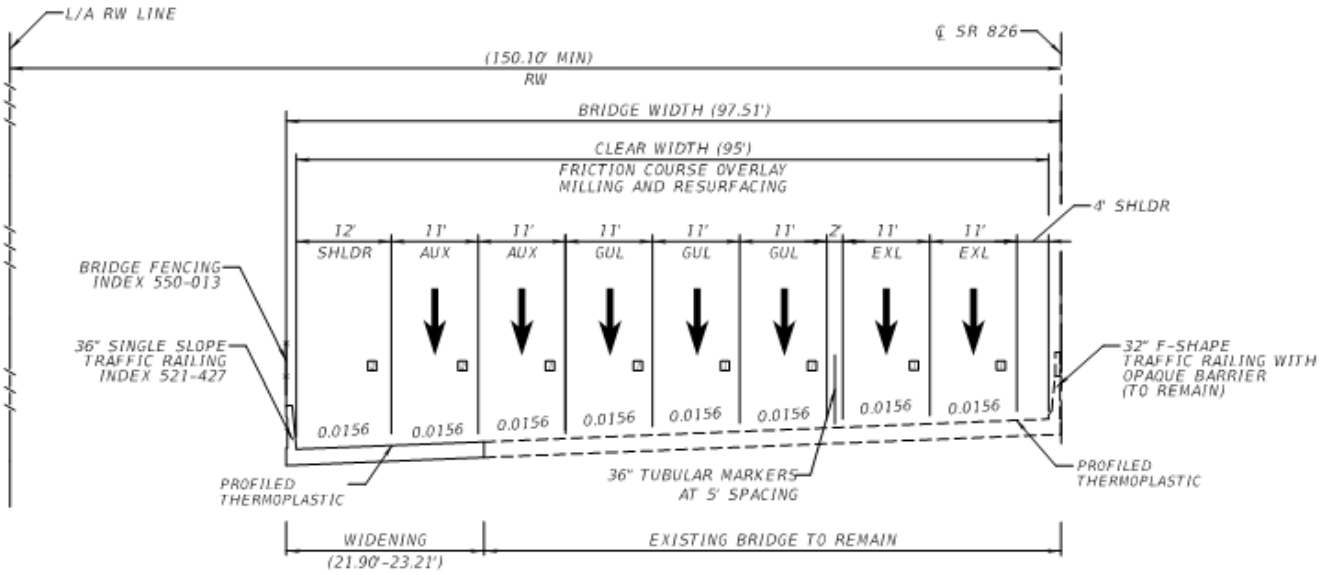
BRIDGE NO. 870856
NW 103RD ST. SB OVER FLYOVER ON-RAMP

6.9.3 Southbound 826 over Metrorail

The SR 826 over Metrorail bridge is proposed to be widened in the Southbound direction to accommodate an additional lane.

Figure 6-7 shows the proposed bridge typical section

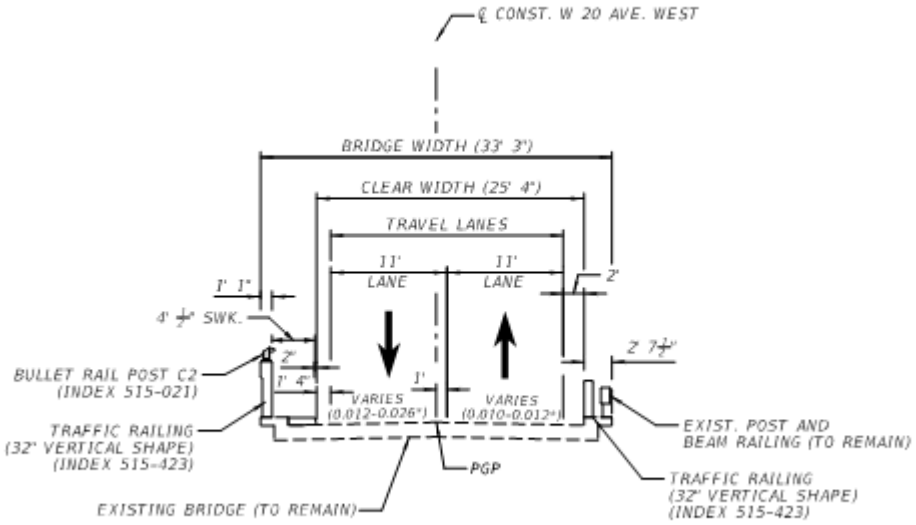
Figure 6-7 | Typical Section: SB 826 over Metrorail, Bridge No. 870257



6.9.4 West Frontage Road over Little River Canal

The West Frontage Road over the Little River Canal improvements consist of barrier replacement, slab replacement, and adding sidewalk on one side. These improvements will take place without widening the bridge. The bridge typical section is shown in **Figure 6-8**.

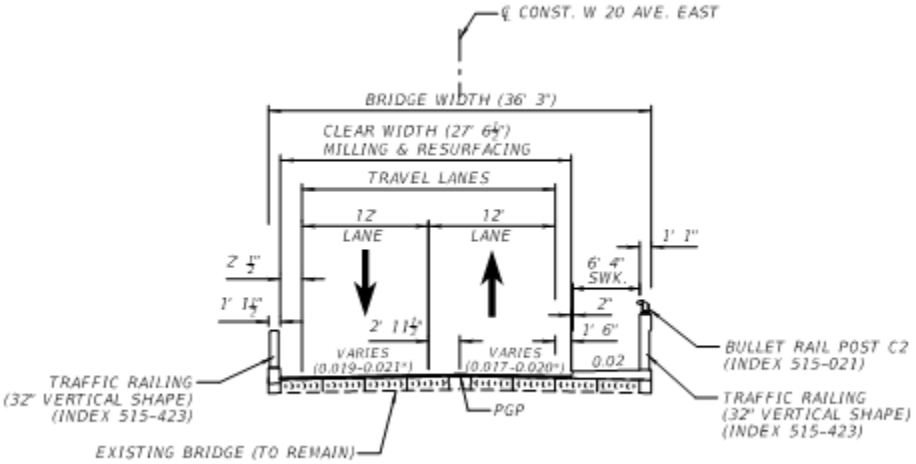
Figure 6-8 | Typical Section: West Frontage Road over Little River Canal, Bridge No. 870569



6.9.5 East Frontage Road over Little River Canal

The East Frontage Road over the Little River Canal improvements consist of barrier replacement, expansion joint header replacement, resurfacing of the asphalt surface, and adding sidewalk on one side. These improvements will take place without widening the bridge. The bridge typical section is shown in **Figure 6-9**.

Figure 6-9 | Typical Section: East Frontage Road over Little River Canal, Bridge No. 870570

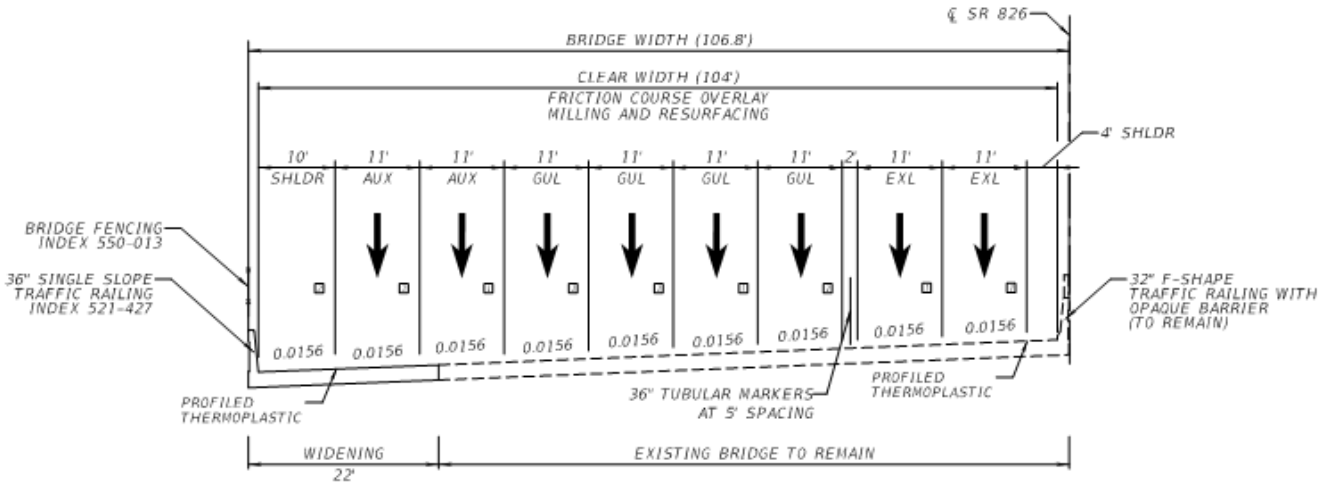


6.9.6 Southbound SR 826 over FEC Railroad

The SR 826 over FEC Railroad is proposed to be widened in the Southbound direction to accommodate an additional lane.

Figure 6-10 shows the proposed bridge typical section

Figure 6-10 | Typical Section: SB SR 826 over FEC Railroad, Bridge No. 870258

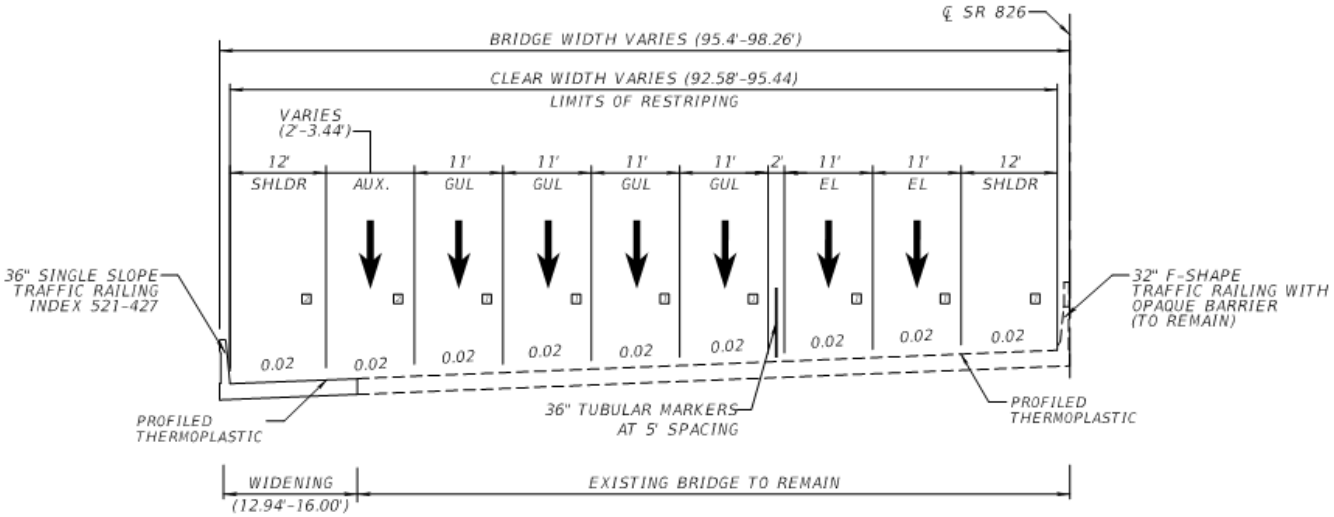


6.9.7 Southbound SR 826 at SR934/NW 74th Street

The SR 826 over SR 934/NW 74th Street is proposed to be widened in the Southbound direction to accommodate an additional lane.

Figure 6-11 shows the proposed bridge typical section

Figure 6-11 | Typical Section: SB SR 826 over NW 74th Street, Bridge No. 870964

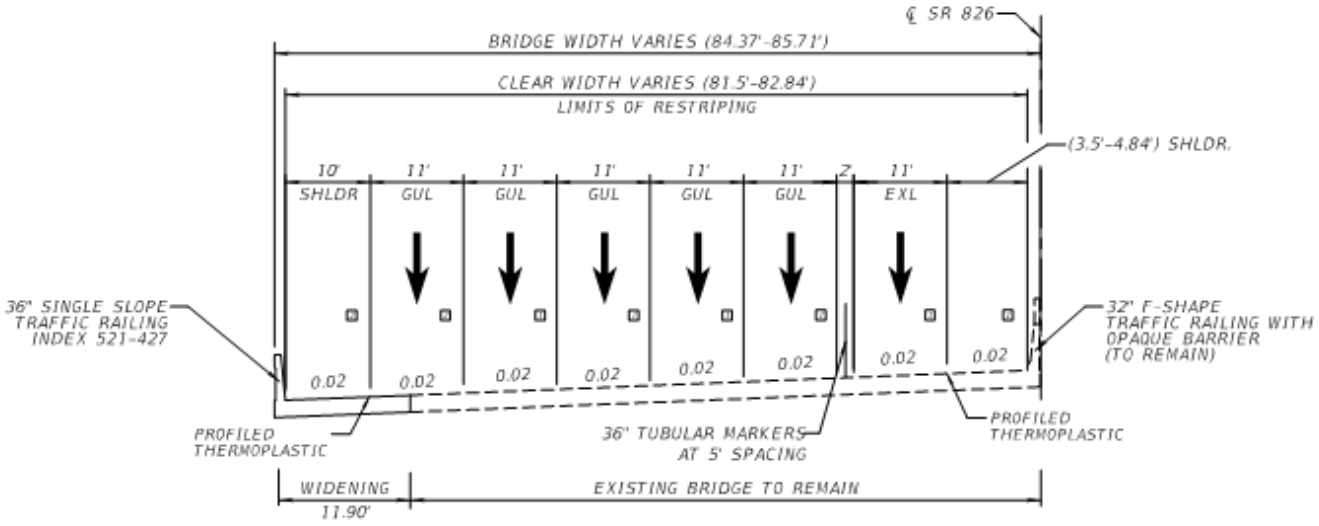


6.9.8 Southbound SR 826 at SR 932/NW 103rd Street

The SR 826 over SR 932/NW 103rd Street is proposed to be widened in the Southbound direction to accommodate an additional lane.

Figure 6-12 shows the proposed bridge typical section

Figure 6-12 | Typical Section: SB SR 826 over NW 103rd Street, Bridge No. 870757

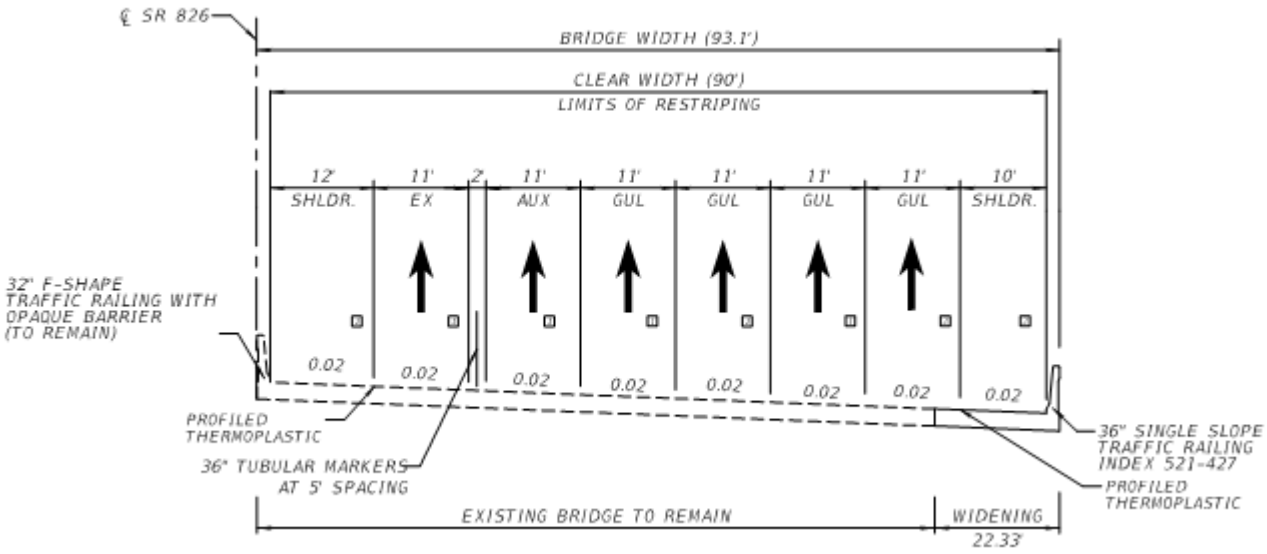


6.9.9 Northbound SR 826 at SR 932/NW 103rd Street

The SR 826 over SR 932/NW 103rd Street is proposed to be widened in the Northbound direction to provide shoulders that meet FDOT standards.

Figure 6-13 shows the proposed bridge typical section

Figure 6-13 | Typical Section: NB SR 826 over NW 103rd Street, Bridge No. 870995



6.9.10 Retaining Wall Modifications

Retaining walls within the construction limits will be modified to accommodate the necessary bridge widenings as noted above.

6.9.11 Aesthetics

The bridges and retaining walls within the construction limits shall meet the requirements of Level One aesthetic criteria, as defined by FDM Section 121.9.3.

6.9.12 ITS Features

Within the project limits, the Intelligent Transportation System (ITS) will be adjusted to support the earlier mentioned roadway changes. ITS improvements include the installation of a new tolling site along both the northbound and southbound directions that will require a specific pavement design to be implemented 50 feet north and south of the gantry location. The project will also include the installation and replacement of impacted Closed-Circuit Television (CCTV) cameras, Dynamic Message Signs (DMS), Microwave Vehicle Detection Systems (MVDS), and Ramp Signal Systems as necessary.

6.10 Maintenance of Traffic

6.10.1 Southbound SR 826

The construction of southbound SR 826 segment consists of three phases. Phase one consists of relocating the SR 826 southbound express lane ingress to the vicinity of NW 103rd Street. Phase two consists of the outside widening to provide the additional lane of capacity in the southbound direction. The third phase consists of milling and resurfacing and the final striping configuration will be placed.

6.10.2 Northbound SR 826

The construction for the northbound SR 826 segment consists of two phases. Phase one consists of outside widening in order to bring shoulders to standard. The second phase consists of milling and resurfacing and the final striping configuration will be placed.

6.10.3 Frontage Roads

The majority of the proposed work on the Frontage Roads can be performed without impacting traffic. For the milling and resurfacing of the roadway full nighttime closures with detours will be needed.

6.10.4 Miscellaneous Overhead Structures

For construction of overhead structures (bridges, sign panels) intermittent detours, lane shifts, lane closures and traffic pacing will be needed. It is recommended to follow techniques described in the FDM Chapter 240.7.1.1.

6.11 Cost Estimates

A construction cost estimate for the Preferred Alternative was prepared both the SR 826 improvements and the frontage road improvements. Please refer to **Appendix C** for the construction cost estimates,

6.12 Environmental Analysis

An environmental analysis was conducted for this PD&E through detailed studies of the Social, Economic, Cultural, Natural, and Physical environments. A detailed discussion of all subjects summarized below and more can be found in the State Environmental Impact Report and the individual corresponding environmental reports.

6.12.1 Existing and Future Land Use

Existing and future land use was assessed through review of statewide generalized land use files. Geographic Information Systems (GIS) shapefiles were downloaded from the Florida Geographic Data Library (FGDL) and compared to the SCE study area. **Table 6-8** reports generalized existing land use by zoning description found within the study area. The predominant land use present is Industrial (29.71%), followed by Residential (20.26%), and Retail Office (19.10%).

Table 6-8 | SCE Study Area Existing Land Use

Existing Land Use	Acres	Percent
Acreage Not Zoned for Agriculture	81.59	2.93%
Agricultural	9.73	0.35%
Centrally Assessed	6.74	0.24%
Industrial	827.02	29.71%
Institutional	87.83	3.15%
Parcels with No Values	3.47	0.12%
Public/Semi-Public	149.45	5.37%
Recreation	71.32	2.56%
Residential	563.91	20.26%
Retail/Office	531.67	19.10%
Right-Of-Way	0.07	0.00%
Vacant Nonresidential	102.88	3.70%
Vacant Residential	326.13	11.71%
Water	22.22	0.80%

According to **Table 6-9**, which reports generalized future land use, the study area is expected to see an increase in industrial uses. Occurring well within the Miami-Dade urban growth boundary, SR 826, a limited access expressway, is consistent with the character and intensity of surrounding development. This project is not expected to affect the current or future land use of the area. No additional right-of-way will be required. Therefore, the acreage per land use type is not expected to change as a direct result of the project. Furthermore, no impacts to recreation and open space are expected by the Build Alternative.

Table 6-9 | SCE Study Area Future Land Use

Future Land Use Description	Acres	Percent
Commercial	296.11	12.17%
Industrial	1268.80	52.13%
Institutional	29.67	1.22%
Mixed Use - General	23.27	0.96%
Recreation	94.50	3.88%
Residential High (> 12 DU/AC)	403.89	16.59%
Residential Medium (5.01 - 12 DU/AC)	211.70	8.70%
Transportation/Utilities	24.39	1.00%
Water	81.72	3.36%

A population and employment analysis conducted by the Miami-Dade TPO for the 2045 LRTP shows that between 2015 and 2045 population is expected to grow by approximately 920,000 (34%) and employment is expected to grow by over 500,000 (38%) within the County. Traversing two (2) of the seven (7) transportation planning areas (Central and Northwest) the greatest employment growth within the County is expected to occur within the Northwest transportation planning area. This area expects an employment increase of 44.1 percent and a modest increase in population of 27.1 percent. The Central transportation planning area expects a lower rate of population and employment growth (32.7% and 36.6% respectively) when compared to the countywide averages. The projected growth in the area will result in a significant increase in travel demand and further deteriorate the conditions on the already congested SR 826 corridor.

Due to the project improvements taking place within existing right-of-way no impacts are expected to adjacent use. Access to residential, employment and community features will likely be enhanced due to reduced congestion and improved traffic flow within the general-purpose lanes.

6.12.2 Cultural Resource Assessment Survey

A Cultural Resource Assessment Survey (CRAS) was prepared as part of the Project Development and Environment (PD&E) Study for the State Road (SR) 826/Palmetto Expressway from South of NW 36th Street (MP 8.355) to North of NW 154th Street (MP 17.950), in the towns of Miami Lakes and Medley and the cities of Doral, Hialeah and Hialeah Gardens, as well as unincorporated Miami-Dade County, Florida (Financial Project ID [FPID] Nos. 447165-1-22-01,

441830-1-22-01, and 441831-1-22-01). The purpose of this CRAS was to locate and evaluate archaeological and historic resources within the area of potential effect (APE) and to assess their eligibility for inclusion in the National Register of Historic Places (National Register) according to the criteria set forth in 36 CFR Section 60.4.

This assessment complies with the revised Chapter 267, Florida Statutes (F.S.); and standards embodied in the Florida Division of Historical Resources (FDHR) Cultural Resource Management Standards and Operational Manual (February 2003), and Chapter 1A-46 (Archaeological and Historical Report Standards and Guidelines), Florida Administrative Code. In addition, this report was prepared in conformity with standards set forth in Part 2, Chapter 8 (Archaeological and Historical Resources) of the FDOT Project Development and Environment (PD&E) Manual (effective July 1, 2020). All work also conforms to professional guidelines set forth in the Secretary of Interior's Standards and Guidelines for Archaeology and Historic Preservation (48 FR 44716, as amended and annotated).

The current study area has been surveyed and evaluated during several recent studies. In 2010, Janus Research conducted a CRAS of the I-75 PD&E Study from SR 826 (Palmetto Expressway) to North of Florida's Turnpike (HEFT), Miami-Dade County, Florida, FM No. 420669-1-22-01 [Florida Master Site File (FMSF) Manuscript No. 17998] as part of a PD&E study that included the evaluation of proposed improvements along SR 826/Palmetto Expressway from NW 103rd Street to NW 154th Street. The State Historic Preservation Officer (SHPO) concurred with the determinations and findings of this survey on February 15, 2011. In 2012, Janus Research conducted a CRAS of the SR 826/Palmetto Expressway Managed Lanes PD&E Study, FM No. 418423-3-22-01 (FMSF Manuscript No. 19276) as part of another PD&E study that included the evaluation of proposed improvements along SR 826/Palmetto Expressway from south of SR 836/Dolphin Expressway to NW 103rd Street. The SHPO concurred with the relevant determinations and findings of this survey on August 3, 2012.

In 2016, Janus Research conducted the CRAS Reevaluation for the SR 826 (Palmetto Expressway) from Flagler Street to NW 154th Street and SR 93/I-75 from SR 826 to NW 170th Street, Miami-Dade County, Florida (FPID Nos. 432687-1-52-01 and 432687-1-52-01; FMSF Manuscript No. 23335). This survey was an update to the 2010 and 2012 CRAS reports conducted due to design changes to the Design Build project to construct improvements evaluated during both the above referenced 2010 PD&E study, as well as the 2012 PD&E study for SR 826 (Palmetto Expressway) from NW 103rd Street to NW 154th Street (432687-3-22-01). This project converted an existing general purpose (GP) lane that was originally built to be operated as a High Occupancy Vehicle (HOV) lane, into an express lane (EL). The project also provided a second EL through widening and reduced lane width, shoulder width, and EL buffer width for the majority of the project limits. The SHPO concurred with the determinations and findings of this survey on November 2, 2016.

After the Palmetto ELs were opened to traffic in August 2019 and toll collection in September 2019, additional congestion and large differential between EL higher speeds and GP lanes lower speeds were observed in both the northbound (NB) and southbound (SB) directions during peak

travel times. Janus Research prepared two CRAS updates, Palmetto Express Lanes Modification – Interim Solution: Cultural Resource Assessment Survey Update to SR 826/Palmetto Expressway Project Development and Environment (PD&E) Study from South of SR 836 to North of SR 93/I-75 (FPID No. 418423-3-22-01), Miami-Dade County, Florida and Palmetto Express Lanes Modification – Interim Solution: Cultural Resource Assessment Survey Update to SR 93/I-75 Project Development and Environment (PD&E) Study from State Road (SR) 826/Palmetto Expressway to North of Florida's Turnpike (FPID No. 420669-1-22-01), Miami-Dade County, Florida (2020a; 2020b) to coordinate an interim solution for the NB lanes to be implemented immediately and to provide measurable improvements without the need to acquire right-of-way (ROW) and to avoid impacts to adjacent Florida Gas Transmission lines. The SHPO concurred with the findings of each of these reports on April 2, 2020.

The current survey is being conducted for the PD&E study to address a permanent solution for both the NB and SB lanes. This survey focused on identifying archaeological resources within the current APE as well as identifying historic resources which have become historic since the time of the previous studies and confirming there are no changes to the eligibility status of the previously identified National Register-eligible historic resources.

Two archaeological resources (8DA40 and 8DA75) were identified within the archaeological APE during the background research. The pedestrian survey did not identify any remains of these sites and confirmed the disturbed nature of the corridor. Subsurface testing within the corridor was not possible due to the extent of hardscape, underground utilities and drainage, and land modification. Previous archaeological monitoring conducted by Archaeological and Historical Conservancy, Inc. during the construction of the improvements for the most recent PD&E in the area documented the presence of fill and extremely disturbed soils within the limits of the previously recorded archaeological sites. The desktop analysis and pedestrian survey determined that the portion of the archaeological APE that was not previously comprehensively surveyed exhibited a low potential for containing intact archaeological sites. No Miami-Dade County-designated archaeological sites or zones are located within the APE.

The historic resources survey resulted in the identification of 49 historic resources within the historic resources APE. The resources include 15 previously recorded historic resources and 34 newly recorded historic resources. The 15 previously recorded historic resources include: six historic linear resources, six historic structures, two historic bridges, and one designed historic landscape. Two of these previously recorded historic resources have been determined eligible for listing in the National Register by the SHPO: the Miami Canal (8DA6525) and the FEC Railway (8DA10107). Twelve previously recorded historic resources were determined ineligible for listing in the National Register by the SHPO (8DA6352, 8DA11420, 8DA11680-8DA11683, 8DA12380-8DA12382, 8DA12389, 8DA12390, and 8DA15160). The one remaining previously recorded historic resource, 8DA12383, was determined to have insufficient information for an evaluation of National Register-eligibility by the SHPO.

FMSF forms were updated for two previously recorded historic resources: 8DA12382 and 8DA12383. The FMSF form for 8DA12382 was updated to correct the address, which is

incorrectly listed in the FMSF, but no changes to the resource since it was last recorded were observed, and it is still considered National Register-ineligible. The FMSF form for 8DA12383 was updated to correct the address, which is also incorrectly listed in the FMSF, and to update the evaluation of significance since it was first recorded since the SHPO did not provide a determination of eligibility. 8DA12383 exhibits a common architectural style found in South Florida, and limited research did not reveal any historical associations with significant people or events. Therefore, 8DA12383 is considered ineligible for listing in the National Register, either individually or as part of a historic district.

The 34 newly recorded resources within the historic resources APE include 27 historic structures (8DA19117-8DA19143), four historic resource groups (8DA19147-8DA19150), and three historic bridges (8DA19154-8DA19156). The four newly recorded resource groups include one industrial complex and three condominium complexes located on parcels that are partially within the historic resources APE. The 31 newly recorded historic resources are considered ineligible for listing in the National Register, either individually or as part of a historic district.

The three bridges identified during this study (8DA19154-8DA19156) are common bridge types, reinforced concrete slab and prestressed concrete multi-beam, and meet the criteria for the 2012 Program Comment issued by the Advisory Council on Historic Preservation (ACHP), Streamlining Section 106 Review for Actions Affecting Post-1945 Concrete and Steel Bridges (ACHP 2012). All three bridges are exempt from Section 106 consideration and were not evaluated for eligibility for the National Register; however, they were recorded and documented in the FMSF.

As previously noted, two resources in the APE have been determined eligible for listing in the National Register by the SHPO: the Miami Canal (8DA6525) and the FEC Railway (8DA10107). At the Miami Canal location, there are no improvements to the facility's bridge structure that crosses over the Miami Canal. At the FEC Railway, the southbound SR 826 bridge will be widened by 22 feet over the railroad to provide the an additional lane of capacity. The widening will include all substructure and superstructure work necessary to complete the widening and the construction of crash walls adjacent to the railroad. However, ROW will be required from the railroad corridor for the new piers and the crash walls, but no materials or features will be impacted and the historic linear resource will continue to convey its significance. Based on the improvements proposed at these two locations, the Miami Canal and the FEC Railway will not be adversely affected by the project. Although this project is being conducted under Chapter 267, F.S., this effects evaluation acknowledges the guidance provided by Section 106 of the National Historic Preservation Act.

6.12.3 Community Facilities

Community features are public or private facilities, organizations, or locations that often hold special importance to local residents. **Figure 4-2** and **Figure 4-3** depict the facility location and corresponds with the tables listed in the section. **Tables 4-7** through **4-16** describe the community focal points present within the quarter-mile SCE study area. These types of facilities include:

- Cemetery
- Civic Center
- Cultural Center
- Existing Recreational Trail
- Fire Station
- Law Enforcement Facility
- Government Building
- Group Care Facility
- HealthCare Facility
- Hospital
- Parks and Recreational Facility
- School
- Social Services Facility
- Religious Facility

No community features will be displaced as a result of the proposed improvements. No negative impacts to community feature access have been identified.

Figure 6-14 | Community Features Key Sheet

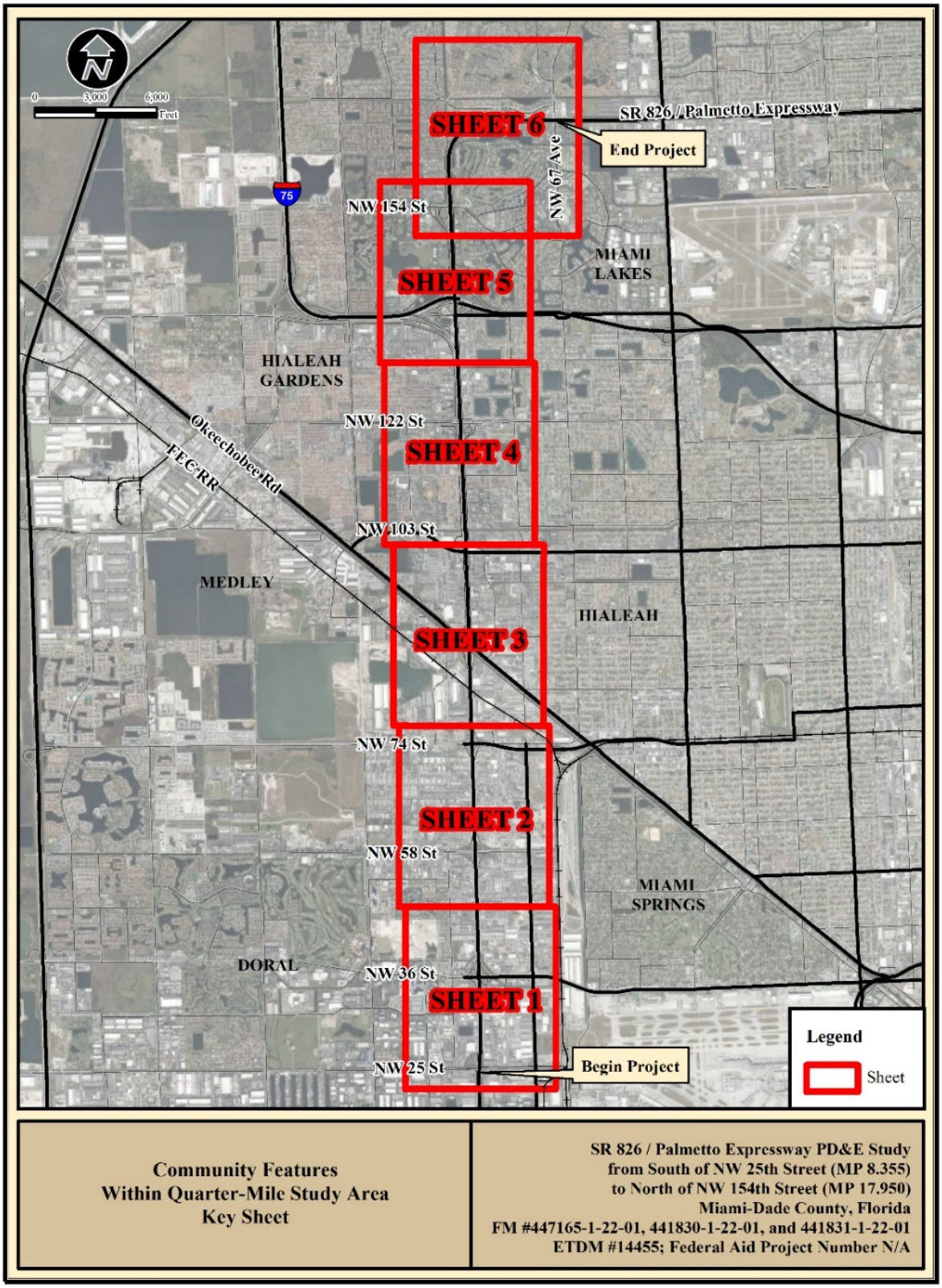


Figure 6-15 | Community Features (1 of 6)

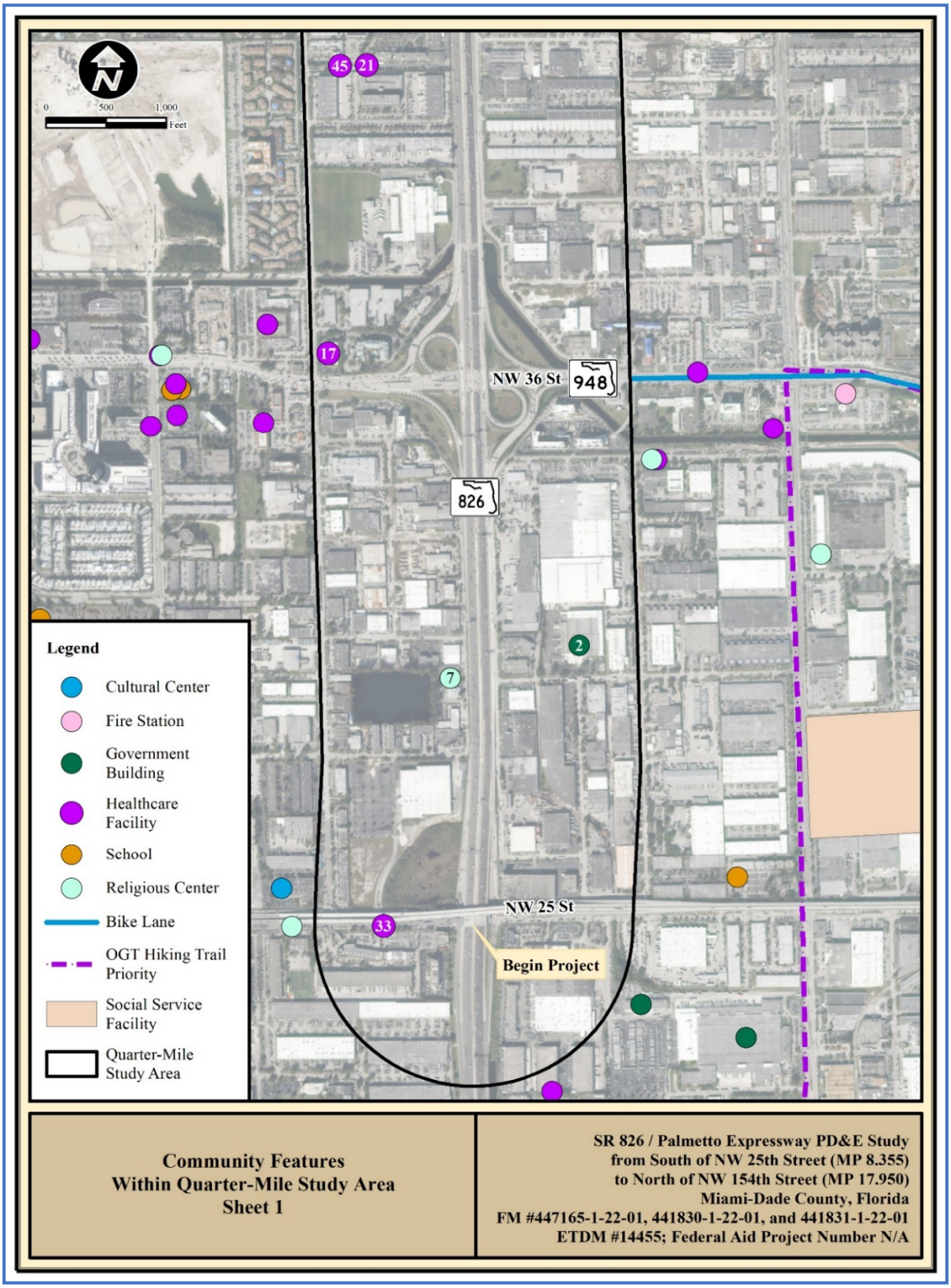


Figure 6-16 | Community Features (2 of 6)

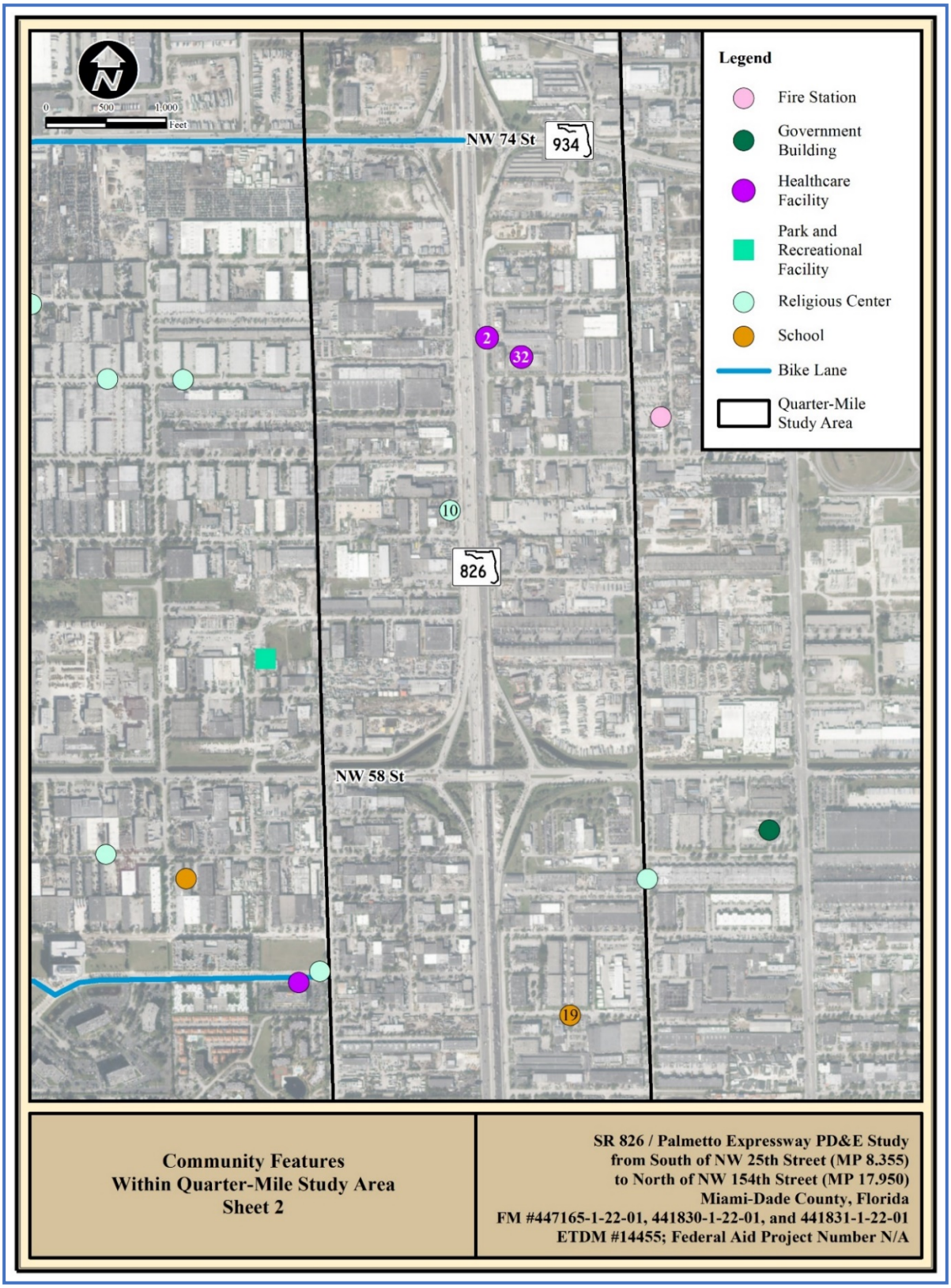


Figure 6-17 | Community Features (3 of 6)

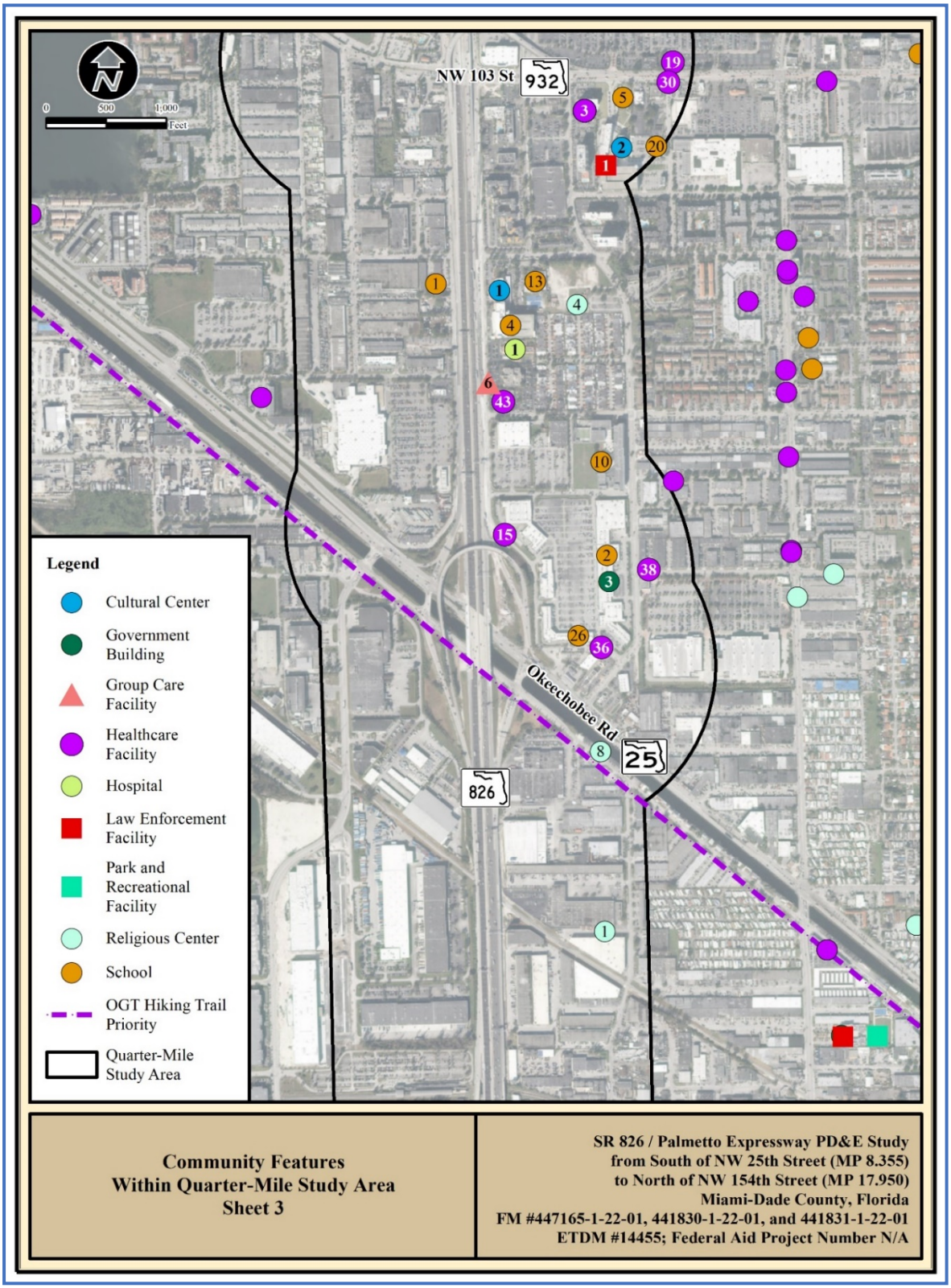


Figure 6-18 | Community Features (4 of 6)

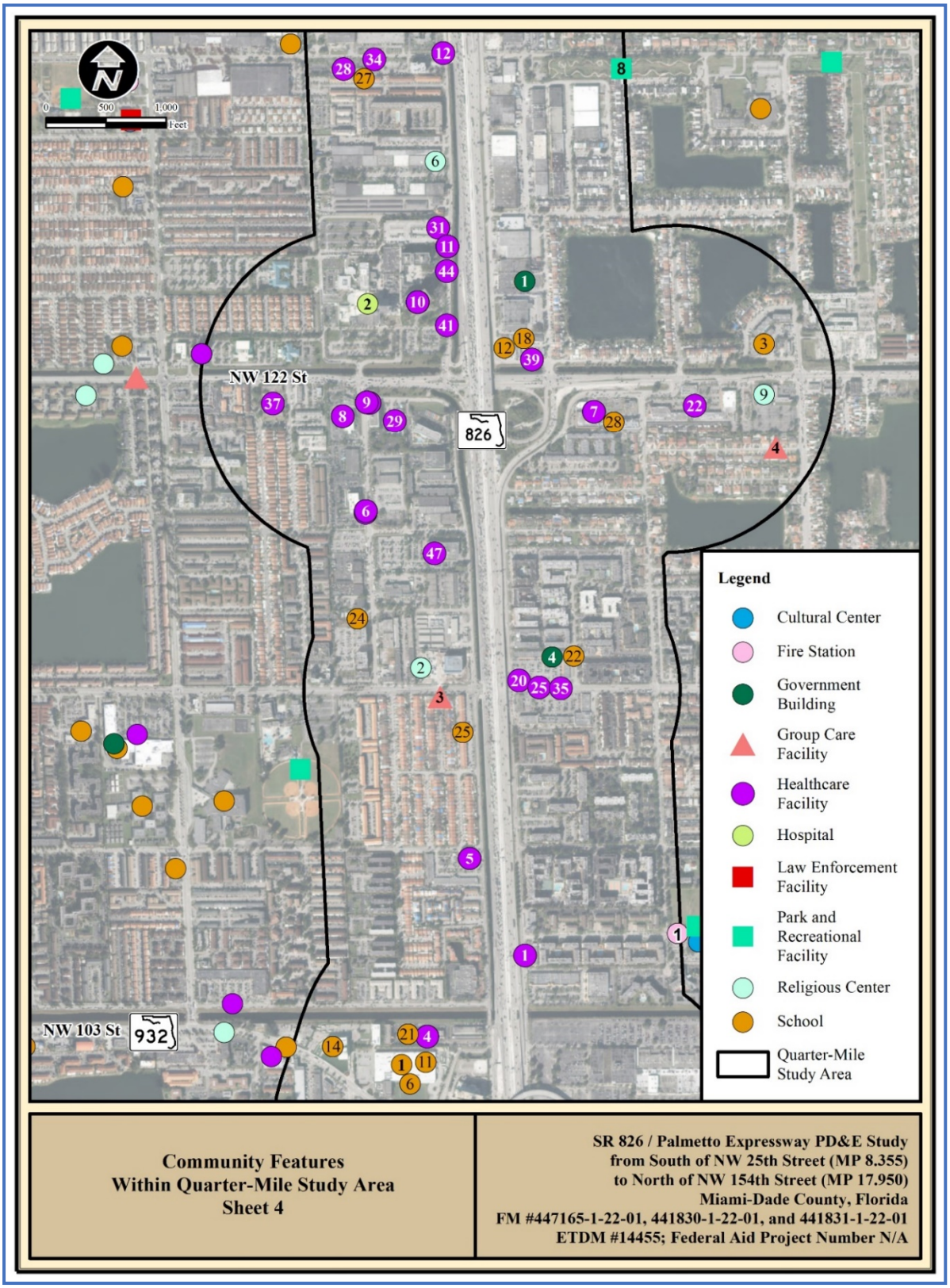


Figure 6-19 | Community Features (5 of 6)

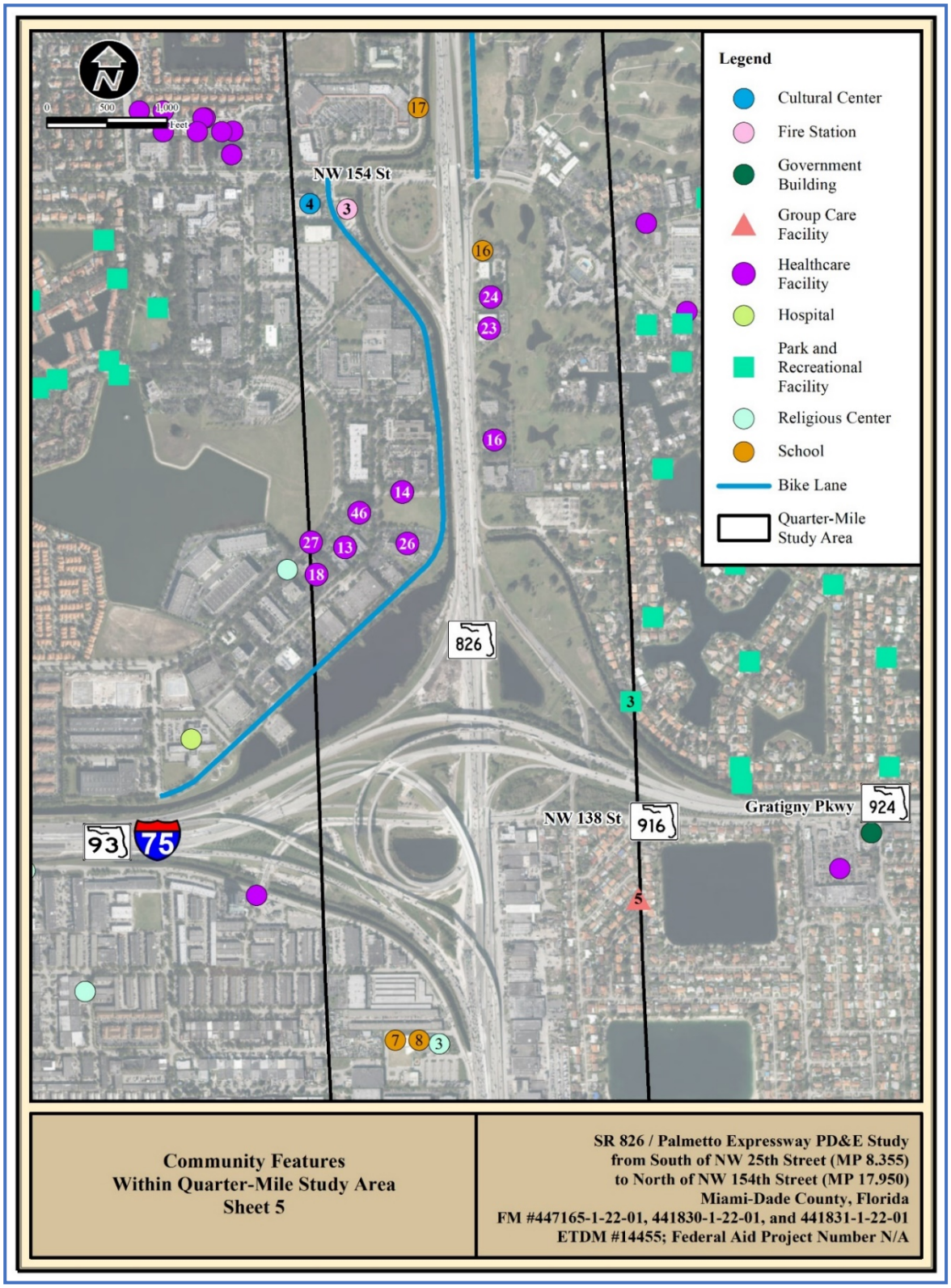


Figure 6-20 | Community Features (6 of 6)

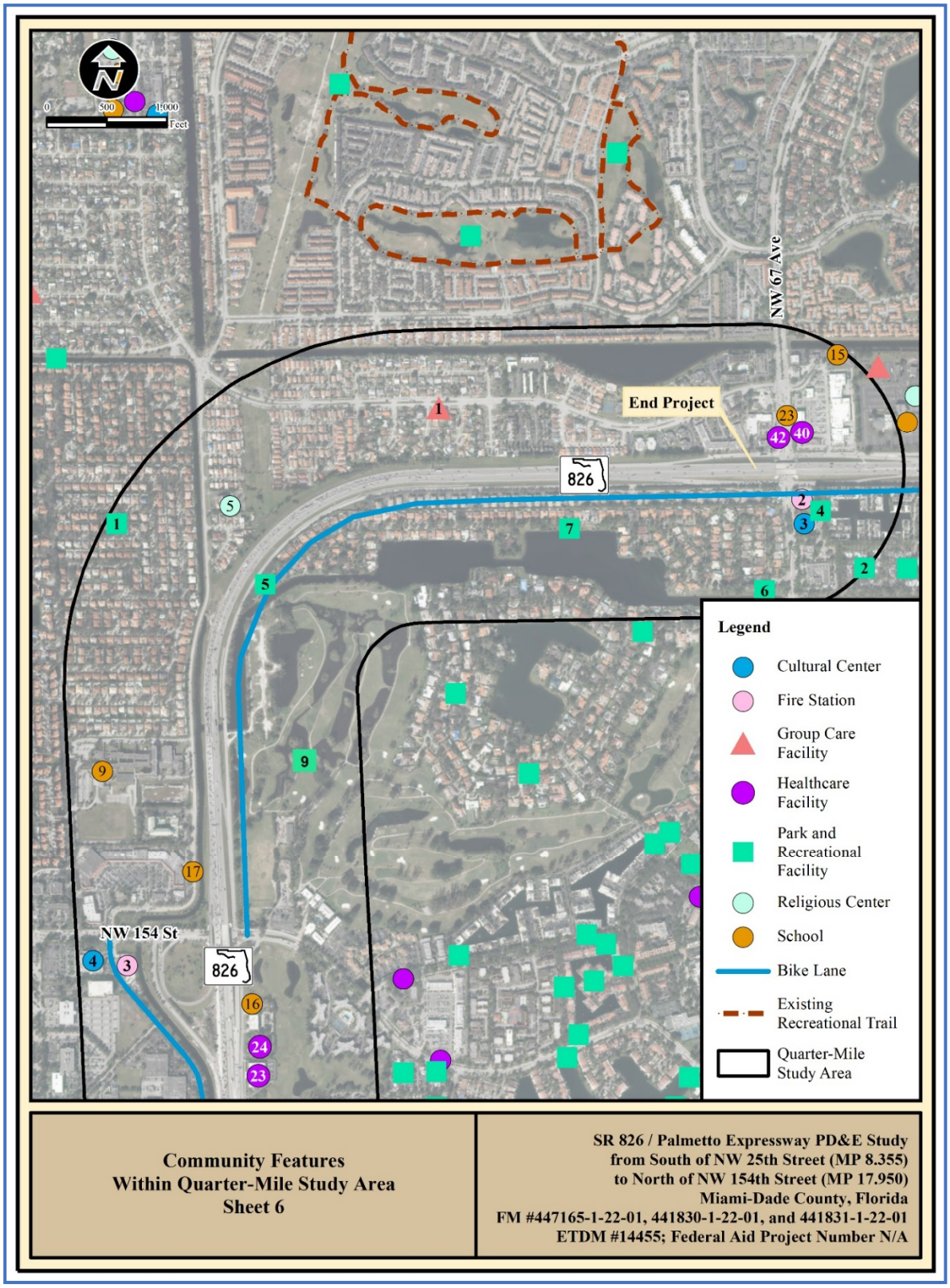


Table 6-10 | Group Care Facilities in SCE Study Area

MAP ID #	Map #	Facility	Address
1	6	Golden Palm A.L.F. Inc.	7280 NW 169 Street
2	3	Citrus Health Network - Adult Crisis Unit	4175 W 20 Avenue
2	3	Citrus Health Network - Children's Crisis Unit	4175 W 20 Avenue
3	4	Sweet Paradise ALF	5991 W 20 Lane
4	4	Our Loving Mother	1635 W 65 Street
5	5	New World ALF	8184 W 18 Avenue

Table 6-11 | Park and Recreational Facilities in SCE Study Area

MAP ID #	Map #	Facility	Address
1	6	Miami Lakes Mini Park (P-86)	6851 Main Street
2	6	Miami Lakes Mini Park (P-56)	16331 Ravenwood Place
3	5	Miami Lakes Mini Park (P-28)	7350 Sabal Drive
4	6	Miami Lakes Mini Park (P-55)	16695 NW 67 Avenue
5	6	Miami Lakes Mini Park (P-50)	7599 Loch Ness Drive
6	6	Miami Lakes Mini Park (P-52)	6700 Loch Ness Drive
7	6	Miami Lakes Mini Park (P-51)	6970 Loch Ness Drive
8	4	Garden of The Arts Park	1850 W 76 Street
9	6	Don Shula's Golf Club	7601 Miami Lakes Drive

Table 6-12 | Law Enforcement Facilities in SCE Study Area

MAP ID #	Map #	Facility	Address
1	3	Miami-Dade College Police Department - Hialeah Campus	1780 W 49 Street (Rm 1114)

Table 6-13 | Hospitals in SCE Study Area

MAP ID #	Map #	Facility	Address
1	3	Southern Winds Hospital	4225 W 20 Avenue
2	4	Palmetto General Hospital	2001 W 68 Street

Table 6-14 | Healthcare Facilities in SCE Study Area

MAP ID #	Map #	Facility	Address
1	4	Perez D.O. Pa Gerardo C.	5355 W 20 Avenue
2	2	Leah Medical Center Inc.	6917 NW 77 Avenue
2	2	Mdd Medical Center	6905-07 NW 77 Avenue
3	3	Mora Elba M.D. P.A.	1840 W 49 Street, Suite 516
3	3	Luis Lugo-Arrendell M.D. P.A.	1840 W 49 Street, Suite 510
3	3	Esperanza Arce- Nunez M.D.	1840 W 49 Street, Suite 420
3	3	Multimed Care Inc	1840 W 49 Street, Suite 700
3	3	International Research Associates, LLC	1840 W 49th Street, Suite 103
3	3	American Family Health Center	1840 W 49 Street, Suite 425
3	3	Savin Medical Group/ Carlos Aguilar	1840 W 49 Street, Suite 229
3	3	Isabel C. Gomez, M.D.	1840 W 49 Street, Suite 517
3	3	Luzmed Clinical Research Institute	1840 W 49 Street, Suite 605
3	3	Spera, Carlos, M.D., P.A.	1840 W 49 Street, Suite 411
3	3	Vicente A. Chavarria Md	1840 W 49 Street, Suite 103
3	3	Eduardo G. Gomez M.D., P.A.	1840 W 49 Street, Suite 607
3	3	Rodrigo Belacazar, M.D., P.L.L.C.	1840 W 49 Street, Suite 601
3	3	Community Clinical Center Inc	1840 W 49 Street, Suite 105
3	3	Faith Medical Group Inc	1840 W 49 Street 514a
4	4	Nuconcept Clinic LLC	10550 NW 77 Court, Suite 312
4	4	Centro De Terapia Avanzada Inc.	10550 NW 77 Court, Suite 308
4	4	Context Medical Group	10550 NW 77 Court, Suite 305
5	4	Fraga Pediatrics & Associates Dba/Prime Care Fc	5590 W 20 Avenue, Suite 100
5	4	South Florida Pediatrics Inc.	5590 W 20 Avenue, Suite 300
5	4	Eduardo A Reyes M.D. P.A	5590 W 20 Avenue, Suite 401
5	4	Yanssel Delgado DPM	5590 W 20 Avenue, Suite 404
6	4	Maria T. Pol-Carballo M.D. P.A.	6450 W 21 Court, Suite 301
6	4	Victores Md Pa Lorenzo	6450 W 21 Court, Suite 205
6	4	Power Pediatrics Inc	6450 W 21 Court, Suite 306
6	4	Cordoves M.D. Lourdes A.	6450 W 21 Court, Suite 305
6	4	21st Century Oncology, LLC Dba Southeast Florida	6450 W 21 Court, Stop 205
7	4	Miguel A. Chamah M.D. Pa.	1800 W 68 Street, Suite 127

MAP ID #	Map #	Facility	Address
7	4	John A. Serpa MD PA	1800 W 68 Street, Suite 115
8	4	Mt. Sinai Cardiac	2150 W 68 Street, Suite 115
8	4	Chen Medical Hialeah	2150 W 68 Street, Suite 200
9	4	Urology Specialists LLC	2140 W 68 Street, Suite 200
9	4	Tenet Florida Physician Services, LLC	2140 W 68 Street, Suite 403
9	4	Moya M.D. Pa Roberto A.	2140 W 68 Street, Suite 201
9	4	Fernandez M.D. P.A. Benedicto	2140 W 68 Street, Suite 406
9	4	Digestive Medicine Assoc.	2140 W 68 Street, Suite 300
9	4	Ravelo Jorge E.	2140 W 68 Street, Suite 307
9	4	Julian Marquez MD PA	2140 W 68 Street, Suite 401A
9	4	Carrillo Pedro L. Jr. M.D.	2140 W 68 Street, Suite 308
9	4	Imaging Center The	2140 W 68 Street 103
9	4	Palmetto ASC L.P. The	2140 W 68 Street, Suite 102
9	4	Aran Eye Association	2140 W 68 Street, Suite 405
9	4	America Mobile Health Service Inc.	2134 W 68 Street
9	4	Urology Specialists, LLC	2140 W 68 Street, Suite 302
10	4	Siguanea LLC	7100 W 20 Avenue, Suite 312
10	4	Allergy and Asthma Center of Miami P.A.	7100 W 20 Avenue, Suite 706
10	4	Rovira, M.D. Juan J.	7100 W 20 Avenue, Suite 404
10	4	Jorge L. Diaz Do Pa	7100 W 20 Avenue, Suite 403
10	4	Salinas M.D. Pa Hugo	7100 W 20 Avenue, Suite 516
10	4	Uro-Medix Inc.	7100 W 20 Avenue, Suite 703
10	4	Orthopedic Specialists of South Fl	7100 W 20 Avenue, Suite 101
10	4	Torres M.D. Julio D.	7100 W 20 Avenue, Suite 105
10	4	Pagan Luis M.D.	7100 W 20 Avenue, Suite G-176
10	4	Fernandez & Molina M.D.	7100 W 20 Avenue, Suite 602
10	4	Halperin, Scott B. M.D.	7100 W 20 Avenue, Suite 213
10	4	Shalhub M.D. Don	7100 W 20 Avenue, Suite 414
10	4	Alhambra Medical Group Inc.	7100 W 20 Avenue, Suite 506
10	4	Campos M.D. Pa Jaime E.	7100 W 20 Avenue, Suite 303
10	4	Tenet Florida Physician Services/Dr. Sangita Gogat	7100 W 20 Avenue, Suite 107
10	4	Jose Pinero, Md	7100 W 20 Avenue, Suite 314
10	4	J.V. Ferreira M.D. P.A.	7100 W 20 Avenue, Suite 801

MAP ID #	Map #	Facility	Address
10	4	Advanced Gastroenterology of South Florida, P.A.	7100 W 20 Avenue, Suite 301
10	4	West Dade Pediatrics Inc.	7100 W 20 Avenue, Suite 411
10	4	Font Jose M.D. P.A.	7100 W 20 Avenue, Suite 806
10	4	Reyes Md Franklin A.	7100 W 20 Avenue, Suite 616
10	4	Andres Vega M.D. P.A.	7100 W 20 Avenue, Suite 601
10	4	Alvarez M.D. Pa Hernando	7100 W 20 Avenue, Suite 304
10	4	Kenneth Strubbe, MD	7100 W 20 Avenue, Suite 107
10	4	Physicians' Management GP. Of Dade, Inc.	7100 W 20 Avenue, Suite 110
10	4	Inpatient Healthcare Group	7100 W 20 Avenue, Suite G-126
10	4	Miami Ob/Gyn Dreams	7100 W 20 Avenue, Suite 803
10	4	Jose Rodriguez-Valdes M.D.	7100 W 20 Avenue, Suite 401
10	4	Steven Fields M.D. P.A	7100 W 20 Avenue, Suite 311
10	4	Northwest Center for Infertility and Reproductive	7100 W 20 Avenue, Suite 205
10	4	Neurology-Neurosurgery of Dade And Broward Inc.	7100 W 20 Avenue, Suite 702
10	4	Miami Interventional Spine Specialists	7100 W 20 Avenue, Suite 210
10	4	Martinez-Alba Jr M.D. Jose R.	7100 W 20 Avenue, Suite 514
10	4	Ason M.D. Rafael	7100 W 20 Avenue, Suite 501
10	4	C & C Medical	7100 W 20 Avenue, Suite 412
10	4	Martinez-Catinchi MD PA Fernando	7100 W 20 Avenue, Suite 402
10	4	Vidal Angel F. M.D. P.A.	7100 W 20 Avenue, Suite 703
10	4	Gilberto Concepcion MD PA	7100 W 20 Avenue, Suite 806
10	4	Sofia E. Vasguez - Solomon M.D	7100 W 20 Avenue, Suite 214
10	4	Cesar A. O'phelan M.D.	7100 W 20 Avenue, Suite 201
11	4	Jaraki Medical Care, P.A.	7150 W 20 Avenue, Suite 318
11	4	Alvarez Pedro G. D.O. P.A.	7150 W 20 Avenue, Suite 607
11	4	Tenet Florida Physician Services LLC	7150 W 20 Avenue, Suite 615
11	4	Gonzalez Abreu &Fernandez MD. PA.	7150 W 20 Avenue, Suite 202
11	4	Shuman Md Pa Joseph	7150 W 20 Avenue, Suite 408
11	4	Dr. Victoria Garcia And Associates LLC	7150 W 20 Avenue, Suite 501
11	4	South Florida Eye Associates	7150 W 20 Avenue, Suite 411
11	4	Florida Center for Allergy & Asthma	7150 W 20 Avenue, Suite 106
11	4	Hamady Ghassan T. M.D.	7150 W 20 Avenue, Suite 406

MAP ID #	Map #	Facility	Address
11	4	Miami Lakes Medical Center Assoc. PA	7150 W 20 Avenue, Suite 615
11	4	Oncology & Radiation Assoc. Pa.	7150 W 20 Avenue, Suite 214
11	4	Pombo, Md, Hector	7150 W 20 Avenue, Suite 313
11	4	Rodriguez M.D. J. Ramon	7150 W 20 Avenue, Suite 402
11	4	Palmetto Artificial Kidney Center	7150 W 20 Avenue, Suite 109
11	4	Rodolfo A. Perez, M.D	7150 W 20 Avenue, Suite 304
11	4	South Florida Gyn\Oncology	7150 W 20 Avenue, Suite 313
11	4	Robert O'Neill MD	7150 W 20 Avenue, Suite 612
11	4	Miami Spine Care	7150 W 20 Avenue, Suite 209
12	4	Karelia Ruiz	7600 W 20 Avenue, Suite 106
12	4	Dr. Mary Jo Villar	7600 W 20 Avenue, Suite 104
13	5	Canton Enrique J. MD.	14505 Commerce Way, Suite 800
13	5	Renovation of Life Dialysis	14505 Commerce Way, Suite 600
13	5	De Quesada Gonzalo Md	14505 Commerce Way, Suite 800
13	5	Rives Elvira J. MD. PA.	14505 Commerce Way, Suite 800
13	5	Diamond Health Medical Care Center Inc	14505 Commerce Way, Suite 750
14	5	B & C Family Health Group P.A	7761 NW 146 Street
14	5	Lysette Iglesias M.D. PA.	7761 NW 146 Street
15	3	Community Medical Group of Hialeah	3805 W 20 Avenue, Suite 105
16	5	Baptist Medical Plaza Miami Lakes Urgent Care	14701 NW 77 Avenue
17	1	Tenet Florida Physician Services	3901 NW 79 Avenue, Suite 222
18	5	Power G Medical Center Corp	14411 Commerce Way, Suite 305
19	3	Dynamic Medical Services	1685 W 49 Street, Suite 1104
20	4	Hialeah Diagnostic Inc.	1991 W 60 Street
21	1	Doral Kidney Center	7755 NW 48 Street, Suite 120
22	4	University Health Care Hialeah, Inc	1700 W 68 Street
23	5 & 6	Miami Children's Hospital, Miami Lakes Outpatient	15025 NW 77 Avenue
24	5 & 6	Interamerican Medical Center	15105 NW 77 Avenue, Floor 4
25	4	Carlos L. Delgado	1957 W 60 Street
26	5	South Fl Pediatric Partners	14400 NW 77 Court, Suite 102
27	5	Universal Imaging and Radiology	14462 Commerce Way
28	4	Westland Medical Center	2150 W 76 Street, Suite 110

MAP ID #	Map #	Facility	Address
29	4	All M.D. Medical Center LLC	2100 W 68 Street
30	3	IQuest Surgery Center Inc	1738 W 49 Street, Suite 8,9,10
31	4	BMA Of Hialeah	7170 W 20 Avenue
32	2	Life Medical Center & Research	6801 NW 77 Avenue, Suite 105
33	1	Concentra Medical Center	7800 NW 25 Street
34	4	Palmetto Lakes Surgical Center	2100 W 76 Street, Suite 101
35	4	A Woman's Option	1933 W 60 Street
36	3	The Medical City	1905 W 35 Street, Suite 105
37	4	Palmetto Rehab and Health Center	6750 W 22 Court
38	3	Florida Health Solution Center	1779 W 37 Street, Suite 1
39	4	Elite Health & Rehabilitation Ctr.	1949 W 68 Street, Suite 200
40	6	Palm Plaza Medical Center, LLC	16795 NW 67 Avenue
41	4	Perez Pediatrics P.A.	7100 W 20 Avenue, Suite G154
42	6	Bridgewater Women Center LLC	16782 NW 67 Avenue
43	3	Citrus Health Network Inc	4125 W 20 Avenue
44	4	Cardiology Diagnostic Serv. So. Fl.	6450 W 21 Court, Suite 201
45	1	Doral Imaging Institute LLC.	7775 NW 48 Street, Suite 150
46	5	Barry M.D. Patrick J.	7850 NW 146 Street, Suite 508
47	4	Leon Medical Centers Inc	2020 W 64 Street

Table 6-15 | Government Buildings in SCE Study Area

MAP ID #	Map #	Facility	Address
1	4	U S Post Office - Hialeah Annex	7000 W 19 Court
2	1	U S Post Office - Miami Periodical Annex	7499 NW 31 Street
3	3	U S Post Office - Promenade	3690 W 18 Avenue
4	4	Florida Department of Highway Safety and Motor Vehicles Service Center	1923 W 60 Street

Table 6-16 | Fire Stations in SCE Study Area

MAP ID #	Map #	Facility	Address
1	4	Hialeah Fire Department and Rescue Station 8	5405 W 18 Avenue

2	6	Miami-Dade County Fire Department and Rescue Station 1 (Miami Lakes)	16699 NW 67 Avenue
3	5 & 6	Miami Lakes West Fire Department Station 64	15325 NW 77 Court

Table 6-17 | Cultural Centers in SCE Study Area

MAP ID #	Map #	Facility	Address
1	3	Florida National College Library	4425 Jose Regueiro Ave
2	3	Miami Dade College - Hialeah Campus Library	1780 W 49 Street
3	6	Miami Lakes Library	6699 Windmill Gate Road
4	5 & 6	Jay I Kislak Foundation Inc	7900 Miami Lakes Drive W

Table 6-18 | Schools in SCE Study Area

MAP ID #	Map #	Facility	Address
1	4	Mater Academy	7700 NW 98 Street
2	3	Florida Career College-Hialeah	3750 West 18 Avenue
3	4	Acceleration Academies LLC Hialeah	1665 W 68 Street, Suite 109
4	3	Florida National College	4425 W 20 Avenue
5	3	Miami Dade College - Hialeah Campus	1776 W 49 Street
6	4	Mater Performing Arts & Entertainment Academy	7901 NW 103 Street
7	5	Youth Co-Op Charter School	7700 West 20 Avenue
8	5	Youth Co-Op Preparatory High School	7700 West 20 Avenue
9	6	Bob Graham Education Center	15901 NW 79 Avenue
10	3	Westland Hialeah Senior High School	4000 W 18 Avenue
11	4	Mater Academy Charter Middle	7901 NW 103 Street
12	4	American Advanced Technicians Institute	6801 W 20 Street
13	3	Our Lady of Charity Private School	1900 W 44 Place
14	4	Mater Academy Elementary	8003 NW 103 Street
15	6	Little College at Ludlam C. Corp.	6545 NW 169 Street
16	5 & 6	Little College at Royal Oaks Plaza	15225 NW 77 Avenue
17	5 & 6	Children's Paradise Learning Center #5	15520 NW 77 Court Rear
18	4	Happy Children Academy	1937 West 68 Street
19	2	Blessed Pediatric Care	7500 NW 52 Street, Suite 100

20	3	Petite World	4680 W 17 Court 5
21	4	Tiny Smile Learning Center	10550 NW 77 Court, Unit 208-212
22	4	Little Children's Learning Academy	1917 W 60 Street
23	6	America's Christian Future Child Care Learning Ctr	16931 NW 67 Avenue
24	4	Paradise Christian School	6184 W 21 Court
25	4	American Christian School & Art	5888 W 20 Avenue
26	3	Miss Carusi Learning Center	1905 W 35 Street
27	4	Steps for Learning Preschool Center	2150 W 76 Street, Suite 101
28	4	Gratigny Day Care Center Corporation	1800 W 68 Street

Table 6-19 | Religious Centers in SCE Study Area

MAP ID #	Map #	Facility	Address
1	3	Centro Cristiano Internacional	7540 NW 82 Street
2	4	Church of Jesus Christ The Almighty	6050 W 20 Avenue
3	5	Church of Christ Hialeah	7700 W 20 Avenue
4	3	San Lazaro Parish	4400 W 18 Avenue
5	6	Orthodox Cathedral of Christ The Savior	16601 NW 77 Court
6	4	Iglesia Cristiano Del Alma	7306 W 20 Avenue
7	1	Comunidad Servicios De Cristo	3100 NW 77 Court
8	3	Iglesia Bautista	8551 NW South River Drive
9	4	Primera Hispana Iglesia	1650 W 68 Street
10	2	Bezerra De Menezes Kardec Spiritist Association	6450 NW 77 Court

6.12.4 Parks and Recreational Facilities

Several park and recreational features exist within the study area as shown in **Table X.** This includes one private golf course and eight parks. Of the nine recreational features eight are located in Miami Lakes and one (Garden of the Arts Park) is located in Hialeah, Florida. Additionally, one Office of Greenways and Trails (OGT) multi-use trail opportunity/hiking trail priority [Miami River Greenway - also a part of the Shared Use Nonmotorized (SUN) trail network]. This project involves no additional right-of-way, therefore recreational features within the study area are expected to see minimal to no impacts.

Table 6-20 | Park and Recreational Facilities in SCE Study Area

MAP ID #	Map #	Facility	Address
1	6	Miami Lakes Mini Park (P-86)	6851 Main Street
2	6	Miami Lakes Mini Park (P-56)	16331 Ravenwood Place
3	5	Miami Lakes Mini Park (P-28)	7350 Sabal Drive
4	6	Miami Lakes Mini Park (P-55)	16695 NW 67 Avenue
5	6	Miami Lakes Mini Park (P-50)	7599 Loch Ness Drive
6	6	Miami Lakes Mini Park (P-52)	6700 Loch Ness Drive
7	6	Miami Lakes Mini Park (P-51)	6970 Loch Ness Drive
8	4	Garden of The Arts Park	1850 W 76 Street
9	6	Don Shula's Golf Club	7601 Miami Lakes Drive

6.12.5 Wetlands

In accordance with Presidential Executive Order (EO) 11990 entitled "Protection of Wetlands" and United States Department of Transportation Order 5660.1A, "Preservation of the Nation's Wetlands" and Part 2, Chapter 9 (Wetlands and Other Surface Waters) of the FDOT PD&E Manual, the project study area was reviewed to identify, quantify, and map wetland communities that are located within the proposed project boundaries. In order to protect, preserve, and enhance wetlands to the fullest extent possible, the FDOT has assessed wetlands that may be affected by proposed roadway improvements.

The water habitats within the Build Alternative consist primarily of stormwater drainage conveyance features, stormwater detention/retention features, wetlands, canals, and surface water features. Based on in-house reviews and field verification, eight (8) stormwater drainage conveyance features, 34 stormwater drainage detention/retention features, six (6) wetlands, three (3) SFWMD-owned canals, five (5) Miami Dade County-owned canals, and three (3) surface water features, comprising a total of 83.59

acres, were identified within the limits of the project study area. Table X-X lists the individual surface water habitats present within the project study area, by FLUCFCS code, FWS classification, and acreage. Descriptions of each surface water habitat are also provided below.

No impacts will result from the No-Build Alternative. The viable Build Alternative will result in approximately 0.16 acre of impacts to permitted drainage feature 19 (DD19) (stormwater drainage detention/retention feature). The impacts are a result of the addition of a new ITS structure and parking area, which is required for roadway operations. The proposed impacts to this feature will be compensated for through the design and construction of the new stormwater management system. As such, compensatory mitigation is not proposed, and a wetland functional assessment was not conducted. No impacts to the identified wetland features in the vicinity of the I-75 interchange will occur as part of the project. In addition, no new impacts to surface water features, including the Miami Canal (C-6), Little River Canal (C-7), and Biscayne Canal (C-8), as well as the Miami-Dade County owned canals, will occur. The existing features within the project study area all provide low quality habitat due to their location with a densely developed urban area and proximity to the existing roadway corridor.

The proposed project will have no significant short-term or long-term adverse impacts to wetlands or surface waters. In accordance with EO 11990, the FDOT has undertaken all actions to avoid and minimize the destruction, loss or degradation of wetlands and surface waters, and to preserve and enhance the natural and beneficial values of wetlands/surface waters in carrying out the agency's responsibilities.

Table 6-21 | Summary of Individual Water Features

ID	Type	FLUCFCS Description	FLUCFCS Code	FWS Classification	Acres in Study Area
DC02	Stormwater Drainage Conveyance Feature	Vegetated Non-forested Wetland	640	PEM1A	0.14
DC03	Stormwater Drainage Conveyance Feature	Vegetated Non-forested Wetland	640	PEM1A/C	0.14
DC04	Stormwater Drainage Conveyance Feature	Vegetated Non-forested Wetland	640	PEM1A	0.12
DC05	Stormwater Drainage Conveyance Feature	Vegetated Non-forested Wetland	640	PEM1A	0.05
DC06	Stormwater Drainage Conveyance Feature	Vegetated Non-forested Wetland	640	PEM1A	0.05
DC07	Stormwater Drainage Conveyance Feature	Vegetated Non-forested Wetland	640	PSS3/EM1A/C	0.26
DC08	Stormwater Drainage Conveyance Feature	Vegetated Non-forested Wetland	640	PSS3/EM1A/C	0.04
DC09	Stormwater Drainage Conveyance Feature	Vegetated Non-forested Wetland	640	PEM1A/C	0.12
DD01	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.82
DD02	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.28
DD03	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	1.42
DD04	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.84
DD05	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.52
DD06	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.52
DD07	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.35
DD08	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.33
DD09	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A/C	1.20
DD10	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.14
DD11	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	1.40
DD12	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	1.98
DD13	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PSS1C	0.19
DD14	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.18

ID	Type	FLUCFCS Description	FLUCFCS Code	FWS Classification	Acres in Study Area
DD15	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	1.63
DD16	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.49
DD17	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.44
DD18	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.69
DD19	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.82
DD20	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.47
DD21	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.06
DD22	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.37
DD23	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	1.89
DD24	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.27
DD25	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.45
DD26	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.11
DD27	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.30
DD28	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.40
DD29	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.46
DD30	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	1.09
DD31	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.11
DD32	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.84
DD33	Stormwater Drainage Detention/Retention Feature	Vegetated Non-forested Wetland	640	PEM1A	0.24
DD34	Stormwater Drainage Detention/Retention Feature	Freshwater Cattail Marsh	6411	PEM1A	3.10
W01	Forested Wetland	Cypress, Wetland Shrub	621,631	PFO2/SS3E	1.12
W02	Shrub Wetland	Wetland Shrub	631	PSS3E	0.17
W03	Forested Wetland	Cypress, Wetland Shrub	621,631	PFO2/SS3E	1.00

ID	Type	FLUCFCS Description	FLUCFCS Code	FWS Classification	Acres in Study Area
W04	Forested Wetland	Cypress	621	PFO2E	0.24
W05	Forested Wetland	Cypress	621	PFO2E	0.43
W06	Forested Wetland	Cypress	621	PFO2E	0.37
SW03	Surface Water Feature [Dressels Dairy Canal]	Streams and Waterways	510	R2UBHx	4.13
SW04	Surface Water Feature [NW 58th Street Canal]	Streams and Waterways	510	R2UBHx	1.70
SW05	Surface Water Feature [Miami Canal (C-6)]	Streams and Waterways	510	R2UBHx	4.88
SW06	Surface Water Feature [Little River Canal (C-7)]	Streams and Waterways	510	R2UBHx	1.14
SW07	Surface Water Feature [Gratigny Canal]	Streams and Waterways	510	R2UBHx	2.75
SW08	Surface Water Feature (Wet Pond)	Reservoirs Less Than 10 Acres	534	PUBHx	2.82
SW09	Surface Water Feature [Grahams Dairy Canal]	Streams and Waterways	510	R2UBHx	3.02
SW10	Surface Water Feature (Wet Pond)	Reservoirs Less Than 10 Acres	534	PUBHx	0.34
SW11	Surface Water Feature [Biscayne Canal (C-8)]	Streams and Waterways	510	R2UBHx	3.28
SW12	Surface Water Feature (Peter's Pike Canal)	Streams and Waterways	510	R2UBHx	27.81
SW13	Surface Water Feature (Wet Pond)	Reservoirs Less Than 10 Acres	534	PUBHx	3.07
TOTAL					**83.59**

***FWS Wetland Descriptions:**
PEM1A: Palustrine, Emergent, Persistent, Temporarily Flooded
PEM1A/C: Palustrine, Emergent, Persistent, Temporarily Flooded/Seasonally Flooded
PSS3/EM1A/C: Palustrine, Emergent, Persistent/Palustrine, Scrub-Shrub, Broad-Leaved Evergreen, Temporarily Flooded/Seasonally Flooded
PSS1C: Palustrine, Scrub-Shrub, Broad-Leaved Deciduous, Seasonally Flooded
PFO2E: Palustrine, Forested, Needle-leaved Deciduous, Seasonally Flooded/Saturated
R2UBHx: Riverine, Lower Perennial, Unconsolidated Bottom, Permanently Flooded, Excavated
PUBHx: Palustrine Unconsolidated Bottom, Permanently Flooded, Excavated

6.12.6 Essential Fish Habitat

The Magnuson-Stevens Fishery Conservation and Management Act (Magnuson-Stevens Act) (MSFCMA), as amended by the Sustainable Fisheries Act of 1996 (Public Law 104-267), established procedures designed to identify, conserve, and enhance EFH for those species regulated under a federal fisheries management plan (FMP). Section 305(b)(2) of the MSFCMA requires federal action agencies to consult with NOAA's NMFS on all actions or proposed actions, authorized, funded, or undertaken by the agency, that may adversely affect EFH. EFH is defined in the MSFCMA as "…those waters and substrate necessary to fish for spawning, breeding, feeding, or growth to maturity."

In accordance with Part 2, Chapter 17 (Essential Fish Habitat) of the FDOT PD&E Manual, coordination with NMFS occurred through the ETDM Screening Tool. The ETDM response stated that the proposed project would not impact areas that support NMFS trust resources. Therefore, an EFH Assessment is not required for this project as the surface waters within the project limits are not tidally influenced and do not contain EFH. Based on the project location and the biological field review, it was confirmed that EFH resources do not exist within the project corridor.

No action is required pursuant to the EFH requirements of the MSFCMA.

6.12.7 Wildlife and Habitat Survey

The project study area was evaluated for potential occurrences of federally listed and state listed plant and animal species in accordance with Section 7 of the Endangered Species Act (ESA) of 1973, as amended; the Fish and Wildlife Conservation Act; the Migratory Bird Treaty Act (MBTA); Part 2, Chapter 16 (Protected Species and Habitat) of the FDOT PD&E Manual; and Chapters 5B-40 and 68A-27, Florida Administrative Code (FAC). It is important to note that all federally listed species are also considered state listed species. Based on this evaluation, a total of ten (10) federally listed animal species, seven (7) state listed animal species, and six (6) state listed plant species, were identified as potentially occurring within the limits of the viable Build Alternative. Additionally, while not state or federally listed under the ESA, the bald eagle (*Haliaeetus leucocephalus*) was included in the protected species analysis due to the regulatory protections associated with this species. **Table 6-22** provides a summary of the federally listed and state listed animal and plant species with potential to occur within the limits of the viable Build Alternative, along with their corresponding effect determinations.

The project study area was also evaluated for the presence of federally-designated Critical Habitat as defined by Congress in 50 Code of Federal Regulations (CFR) 17. Based on this evaluation, it was determined that state-designated Critical Habitat exists for the West Indian manatee (*Trichechus manatus latirostris*) within the Miami Canal (C-6), NW 25th Street Canal, and Northline Canal. Based on the availability of habitat, including designated Critical Habitat, the potential for occurrence of this species

within the study area is High. The project is also located within the FWS Consultation Areas for the Everglade snail kite (*Rostrhamus sociabilis plumbeus*), American Crocodile (*Crocodylus acutus*), and the Florida bonneted bat (*Eumops floridanus)*.

Table 6-22 | Summary of Listed Species and Effect Determinations

	Common Name	Scientific Name	Federal Status	State Status	Occurrence Potential	Effect Determination
Federally Listed Wildlife Species	**Mammals**					
	Florida Bonneted Bat	*Eumops floridanus*	E	FE	Low	No Effect
	West Indian Manatee	*Trichechus manatus latirostris*	T	FT	High	May affect, not likely to adversely affect
	Reptiles					
	American Crocodile	*Crocodylus acutus*	T	FT	Low	No Effect
	Eastern Indigo Snake	*Drymarchon corais couperi*	T	FT	Low	May affect, not likely to adversely affect
	Birds					
	Bachman's Warbler	*Vermivora bachmanii*	E	FE	Low	No Effect
	Everglade Snail Kite	*Rostrhamus sociabilis plumbeus*	E	FE	Low	No Effect
	Wood Stork	*Mycteria americana*	T	FT	High	May affect, not likely to adversely affect
	Insects					
	Bartram's Hairstreak Butterfly	*Strymon acis bartrami*	E	FE	None	No Effect
	Florida Leafwing Butterfly	*Anaea troglodyta floridalis*	E	FE	None	No Effect
	Miami Blue Butterfly	*Cyclargus thomasi bethunebakeri*	E	FE	None	No Effect
State Listed Wildlife Species	**Reptiles**					
	Gopher Tortoise	*Gopherus polyphemus*	C(1)	ST	Low	No Effect Anticipated
	Birds					
	Florida Burrowing Owl	*Athene cunicularia floridana*	NL	ST	Low	No Effect Anticipated

	Little Blue Heron	*Egretta caerulea*	NL	ST	Moderate	No Adverse Effect Anticipated
	Roseate Spoonbill	*Platalea ajaja*	NL	ST	Low	No Effect Anticipated
	Southeastern American Kestrel	*Falco sparverius paulus*	NL	ST	Low	No Effect Anticipated
	Tricolored Heron	*Egretta tricolor*	NL	ST	High	No Adverse Effect Anticipated
	Least Tern	*Sternula antillarum*	NL	ST	Low	No Effect Anticipated
	Bald Eagle(2)	*Haliaeetus leucocephalus*	NL	NL	Low	N/A
State Listed Plant Species	**Plants**					
	Golden Leather Fern	*Acrostichum aureum*	NL	ST	Planted within ROW for landscaping	No Effect Anticipated
	Everglades Palm	*Acoelorraphe wrightii*	NL	ST	Planted within ROW for landscaping	No Effect Anticipated
	Satin-Leaf	*Chrysophyllum oliviforme*	NL	ST	Planted within ROW for landscaping	No Effect Anticipated
	Simpson's Stopper	*Myrcianthes fragrans*	NL	ST	Planted within ROW for landscaping	No Effect Anticipated
	Royal Palm	*Roystonea elata*	NL	SE	Planted within ROW for landscaping	No Effect Anticipated
	West Indian Mahogany	*Swietenia mahagoni*	NL	ST	Planted within ROW for landscaping	No Effect Anticipated

F = Federally Listed / S = State Listed / E = Endangered / T = Threatened / NL = Not Listed

(1) **The gopher tortoise is currently a candidate species for federal protection under the ESA.**

(2) The bald eagle is neither state nor federally listed; however, this species is federally protected by the Bald and Golden Eagle Act. The bald eagle is also managed in Florida by the FWC's bald eagle rule (FAC 68A-16.002).

6.12.8 Floodplains/Floodways

Based on a review of available Geographic Information System (GIS) data and the Miami-Dade County Flood Zone data, the project corridor is located within Zone AH and Zone X of the 100-year floodplain. However, this project will not: 1) affect flood heights or base floodplain limits, 2) result in increased or new adverse environmental impacts, 3) increase flood risks or damage, or 4) significantly change the potential for interruption or termination of emergency service or emergency evacuation routes. Therefore,

this project will not encroach upon the base floodplain, as defined in Part 2, Chapter 13 (Floodplains) of the FDOT PD&E Manual.

6.12.9 Noise

A traffic noise analysis was conducted in accordance with Title 23 Code of Federal Regulations (CFR) 772, Procedures for Abatement of Highway Traffic Noise and Construction Noise (July 13, 2010) and Part 2, Chapter 18 (Highway Traffic Noise) of the FDOT PD&E Manual. Traffic noise levels were predicted for noise sensitive locations along the project corridor for the existing conditions and the design year (2040) No-Build and recommended Build Alternative. Build Alternative traffic noise levels are expected to range from approximately 37.2 to 79.0 dB(A) during the project's design year. Worst-case design year traffic noise levels with the Build Alternative are predicted to be no more than 1.9 dB(A) greater than existing traffic noise levels.

Design year traffic noise levels with the planned improvements are predicted to approach or exceed the Federal Highway Administration (FHWA) Noise Abatement Criteria (NAC) for residential use [67 dB(A)] at 416 residences and five (5) special use/non-residential sites. Therefore, planned improvements were determined to generate noise impacts at noise sensitive sites within the project study area. In accordance with traffic noise study requirements set forth by both the FHWA and FDOT, noise barriers were considered for all noise sensitive receptor sites where design year Build Alternative traffic noise levels were predicted to equal or exceed the NAC. Noise barriers were evaluated at nine (9) locations to mitigate these predicted noise impacts.

Due to the limited scope of the project's improvements, limited available right-of-way and poor abatement performance, none of the noise barriers evaluated for the nine (9) impacted Common Noise Environments (CNE) are recommended for construction at this time. Based on the noise analyses performed to date, there are no apparent solutions available to mitigate the noise impacts at any of 416 impacted residences and five (5) impacted special land use sites. The traffic noise impacts to these noise sensitive sites are considered to be an unavoidable consequence of the project.

6.12.10 Contamination

In accordance with Volume 2, Chapter 20 of the FDOT PD&E Manual, potential contamination impacts in the area surrounding the project corridor were assessed for the viable Build Alternative as well as the No-Build Alternative.

After a review of all available data, such as agency file reviews at FDEP, the EDR database report, aerial photography, and confirmed by site reconnaissance, contamination of soil and groundwater has been documented in the vicinity of the project corridor. A total of 31 sites of potential environmental concern were identified for the project corridor; of these, five (5) sites are rated as High risk, two (2) sites are rated

as Medium risk, 19 sites are rated as Low risk and five (5) sites are rated as No risk. The status of the sites will be updated accordingly at each future design phase. Remaining sites identified in the above-referenced sources are not considered to pose potential contamination concerns because of the current regulatory status of the site and/or the distance from the project corridor.

The FDOT District VI Planning and Environmental Management Office will utilize the information contained in this report to determine the need for additional investigation during the design phase of the Project. The Level II Contamination Assessment investigation may be conducted prior to any right-of-way acquisition and/or prior to the design phase, should any become necessary. Based on the findings of updated future review and Level II investigation, the design engineers may be instructed to avoid the areas of concern or to include special provisions with the plans to require that the construction activities performed in the areas of concern be performed or supervised by a contamination assessment and remediation contractor specified by the FDOT.

It must be recognized that the possibility exists that some contaminated substances, petroleum products, or environmental contamination not identified during this assessment may exist on or in the immediate vicinity of the project. This is because regulatory agency records are not always complete; not all leaks, spills, and discharges are reported; not all USTs and ASTs are registered. It is unknown if any registered substances were illegally dumped or were deposited during past construction activities.

If construction dewatering will be necessary during construction, a Water Use Permit from SFWMD may be required. The contractor will be held responsible for ensuring compliance with any necessary dewatering permit(s). The dewatering plan will need to consider the radius of influence of any dewatering activity on nearby contamination plumes to avoid potential contamination plume exacerbation. The status of the sites will be updated accordingly at each future design phase. All permits will be obtained in accordance with Federal, State, and local laws and regulations.

6.12.11 Right–of-Way

Existing right-of-way along the SR 826 corridor ranges from approximately 235 feet to 455 feet or more in width near the existing interchanges. The existing right-of-way along the frontage road systems is typically 50 feet. with a minimum of 46.4 feet on the East Frontage Road/W 20th Avenue at W 64th Street and maximum of 108.9 feet on the West Frontage Road/NW 77th Avenue at NW 122nd Street.

6.12.12Value Engineering Review

A Value Engineering review was not conducted on this project.

7.0 List of Technical Reports Completed for the Project

- Air Quality Report
- Natural Resources Evaluation
- Water Quality Impact Evaluation
- Contamination Screening Evaluation Report
- Socio-Cultural Effects Evaluation
- Noise Study Report
- Cultural Resource Assessment Survey
- Drainage Report
- Traffic Analysis Methodology Report
- Calibration Report
- Traffic Operations Analysis Summary Report

Appendix A

Concept Plans (under separate cover)

Appendix B

Typical Section Package

STATE OF FLORIDA

DEPARTMENT OF TRANSPORTATION

TYPICAL SECTION PACKAGE

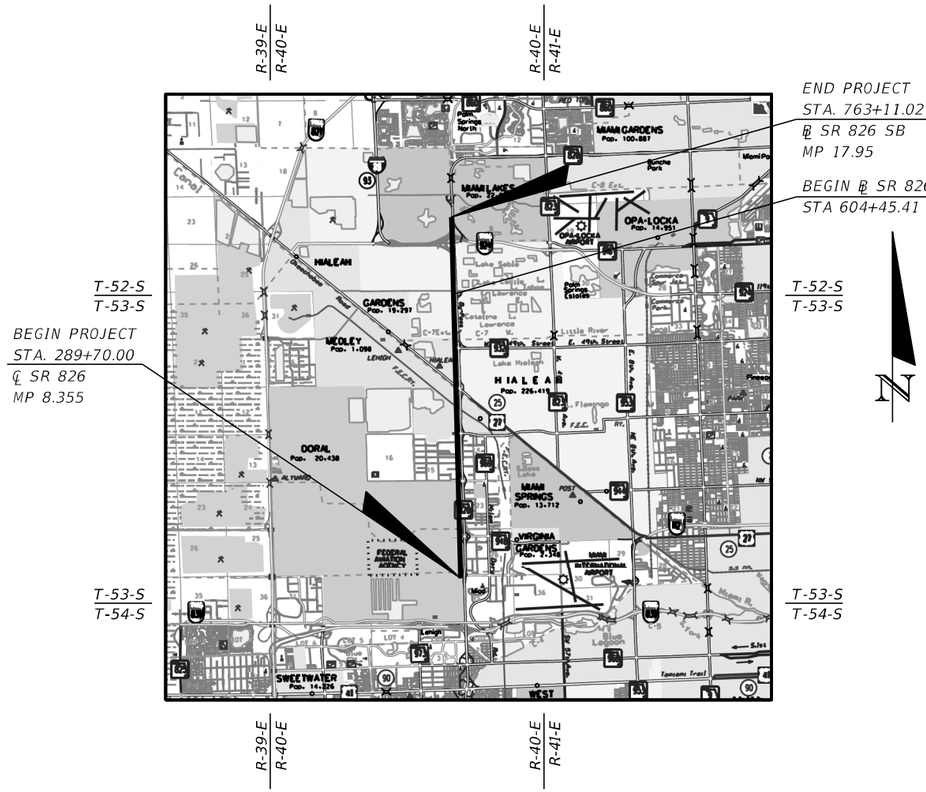
FINANCIAL PROJECT ID 447165-1-52-01

MIAMI-DADE COUNTY (87260)

STATE ROAD NO. 826

FROM SOUTH OF NW 36TH ST. TO NW 154TH ST.

THIS TYPICAL SECTION PACKAGE INCLUDES
FINANCIAL PROJECT ID(S):
441830-1-52-01 AND 441831-1-52-01



BRIDGE NO.	CROSSING	STATION		MILEPOST		BRIDGE NO.	CROSSING	STATION		MILEPOST	
		BEGIN	END	BEGIN	END			BEGIN	END	BEGIN	END
870964	SR 826 OVER NW 74TH STREET	435+50.81	437+29.87	11.346	11.379	870856	NW 103RD ST. SB FYLOVER ON-RAMP	100+00.00	110+84.70	13.213	13.224
870257	SR 826 OVER METRORAIL	445+72.21	446+98.06	11.541	11.574	870570	W 20TH AVE E OVER LITTLE RIVER CANAL	310+26.79	311+36.42	0.197	0.214
870258	SR 826 OVER FEC RR	462+17.94	463+67.36	11.835	11.877	870569	W 20TH AVE W OVER LITTLE RIVER CANAL	411+81.83	412+71.84	0.222	0.239
870975	SR 826 OVER S. RIVER DR./MIAMI CANAL /OKEECHOBEE ROAD	481+20.39	485+91.26	12.197	12.288	870758	SR 826 OVER LITTLE RIVER CANAL	540+84.25	541+69.15	13.335	13.359
						870957	SR 826 OVER W 60TH STREET	567+82.06	568+87.97	13.846	13.872
870995	SR 826 NB OVER NW 103RD STREET	529+96.72	532+28.78	13.129	13.179	870766	SR 826 OVER NW 122ND STREET	593+16.24	594+71.22	14.324	14.362
870757	SR 826 SB OVER NW 103RD STREET	529+96.72	532+28.78	13.129	13.179	870467	SR 826 OVER NW 138TH STREET	757+71.93	758+67.78	15.332	15.363

APPROVED BY:

JAVIER MANSO
LICENSE
No 69183
STATE OF
FLORIDA
PROFESSIONAL ENGINEER

THIS ITEM HAS BEEN DIGITALLY SIGNED AND SEALED BY:

Javier Manso
2020.09.28 14:06:38-04'00'

ON THE DATE ADJACENT TO THE SEAL

PRINTED COPIES OF THIS DOCUMENT ARE NOT CONSIDERED SIGNED AND SEALED. THE SIGNATURE MUST BE VERIFIED ON ANY ELECTRONIC COPIES.

HDR ENGINEERING, INC.
15450 NEW BARN ROAD, SUITE 304
MIAMI LAKES, FLORIDA 33014
CERTIFICATE OF AUTHORIZATION 4213
JAVIER MANSO, P.E. NO. 69183

THE ABOVE NAMED PROFESSIONAL ENGINEER SHALL BE RESPONSIBLE FOR THE FOLLOWING SHEETS IN ACCORDANCE WITH RULE 61G15-23.004, F.A.C.

TYPICAL SECTION PACKAGE

SHEET NO	SHEET DESCRIPTION
1	COVER SHEET
2-37	TYPICAL SECTION NO. 1 - NO. 36

TYPICAL SECTION CONCURRENCE

Digitally signed by: Karina Fuentes
Date: 2020.09.30 09:57:39 -04'00'

FDOT DISTRICT DESIGN ENGINEER

FDOT DISTRICT STRUCTURES DESIGN ENGINEER

FHWA TRANSPORTATION ENGINEER

DESIGN SPEED AND POSTED SPEED CONCURRENCE:

Digitally signed by: omar.meitin@dot.state.fl.us
Date: 2020.10.08 15:56:36 -05'00'

FDOT DISTRICT TRAFFIC OPERATIONS ENGINEER

Digitally signed by: Karina Fuentes
Date: 2020.09.30 09:58:07 -04'00'

FDOT DISTRICT DESIGN ENGINEER

CONTEXT CLASSIFICATION CONCURRENCE:

Digitally signed by: Calvin R Mason
Date: 2020.10.08 14:17:39 -04'00'

FDOT DISTRICT PLANNING AND ENVIRONMENTAL ADMINISTRATOR

SHEET NO.
1

9/28/2020 11:10:36 AM

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

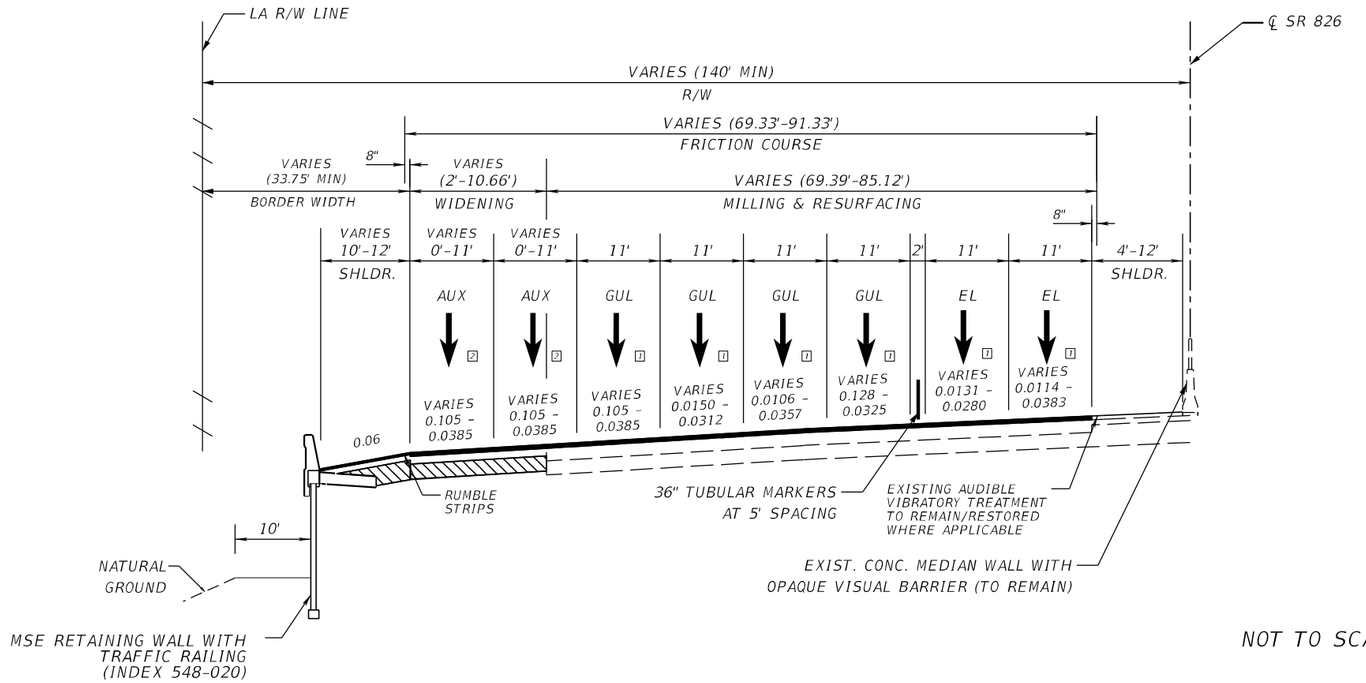
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION
1. LANE & SHOULDER WIDTH

DESIGN VARIATION
1. SHOULDER WIDTH
2. CROSS SLOPE
3. EXPRESS LANE BUFFER SEPARATION WIDTH
4. BORDER WIDTH
5. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 1



NOT TO SCALE

SR 826 (SOUTHBOUND ONLY)
STA. 434+78.16 TO STA. 467+49.78

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE RANGE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	2

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

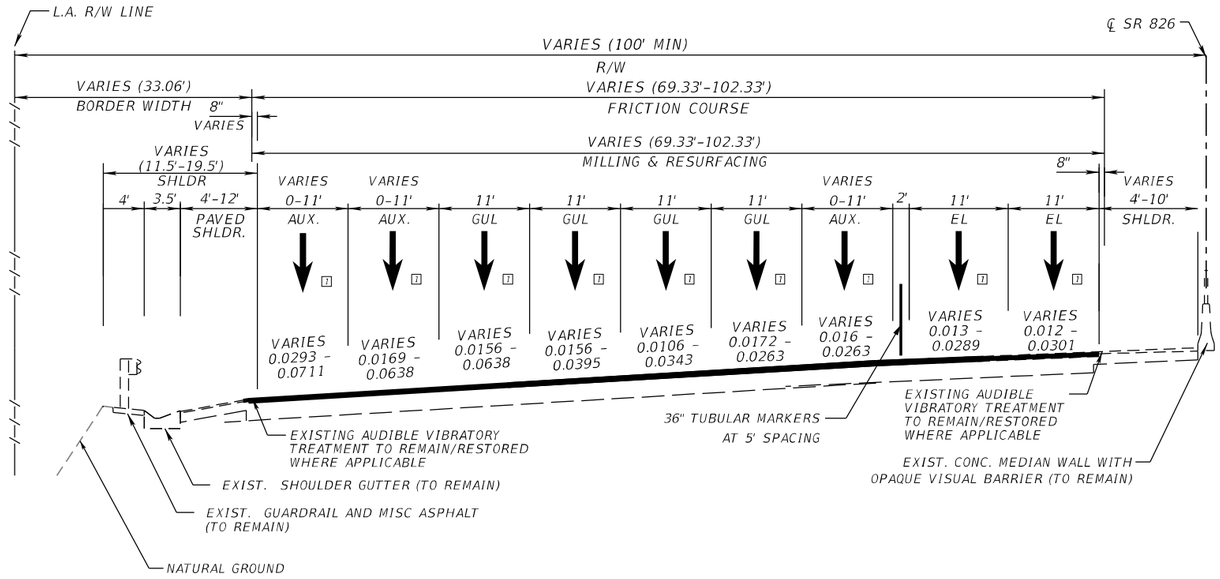
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION:
1. LANE WIDTH

DESIGN VARIATION:
1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 2



SR 826 (SOUTHBOUND ONLY)

STA. 467+49.78 TO STA. 497+17.00

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	3

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
(X) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
(X) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
( ) LOCAL

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

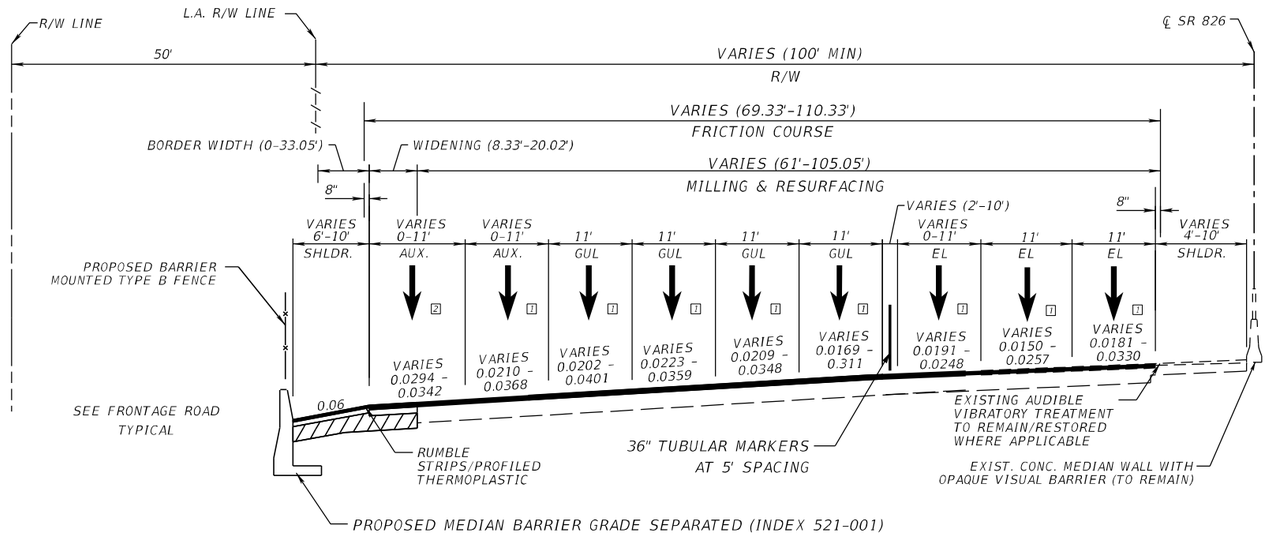
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION:
1. LANE WIDTH

DESIGN VARIATION:
1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. MINIMUM OFFSET TO HAZARD ON TOP OF BARRIER WALL
3. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 3



SR 826 (SOUTHBOUND ONLY)
STA 497+17.00 TO STA 518+41.90

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
[1.] MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)
[2.] MATCH ADJACENT LANE CROSS SLOPE. VALUE RANGE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	4

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

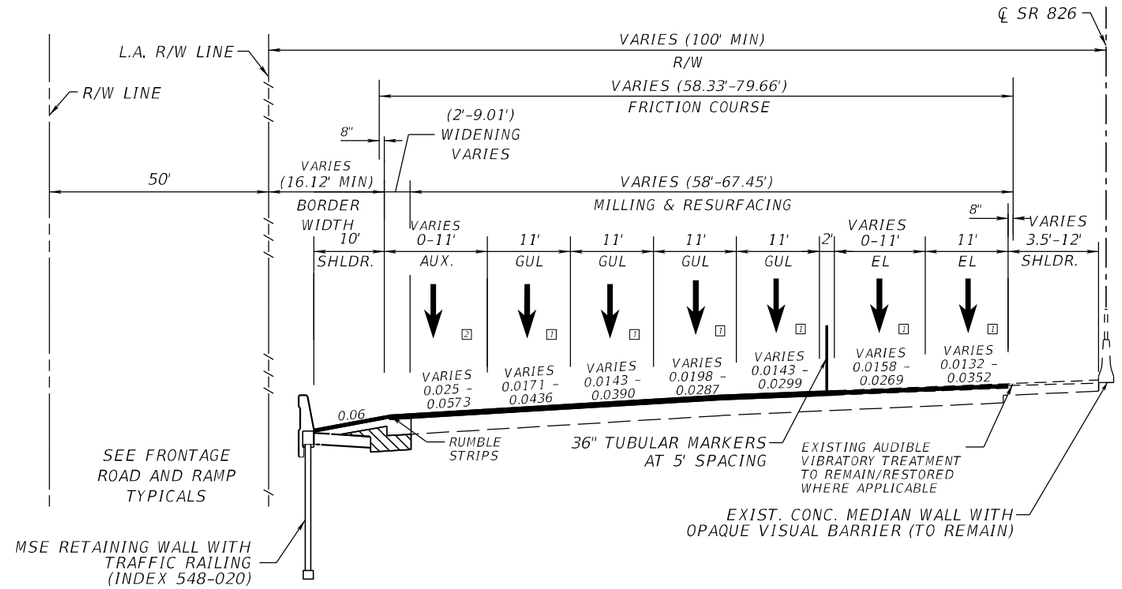
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION
1. LANE & SHOULDER WIDTH

DESIGN VARIATION
1. CROSS SLOPE
2. EXPRESS LANE BUFFER SEPARATION WIDTH
3. BORDER WIDTH
4. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 4



SR 826 (SOUTHBOUND ONLY)
STA. 518+41.90 TO STA. 541+65.30

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE RANGE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	5

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
(X) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
(X) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
( ) LOCAL

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

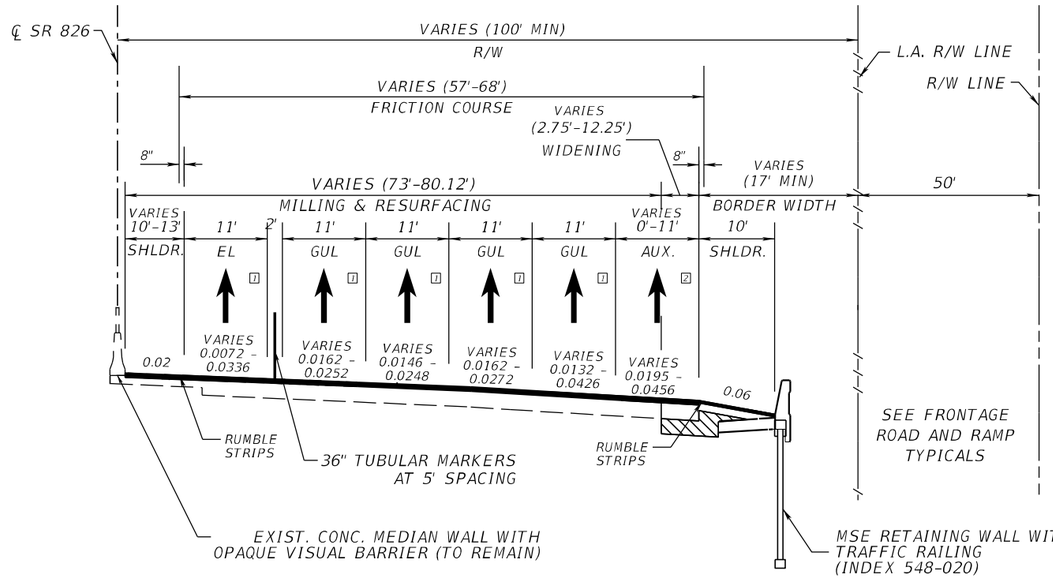
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION
1. LANE WIDTH

DESIGN VARIATION
1. SHOULDER WIDTH
2. CROSS SLOPE
3. EXPRESS LANE BUFFER SEPARATION WIDTH
4. BORDER WIDTH
5. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 5



SR 826 (NORTHBOUND ONLY)
STA. 520+08.96 TO STA. 538+48.37

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE RANGE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	6

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

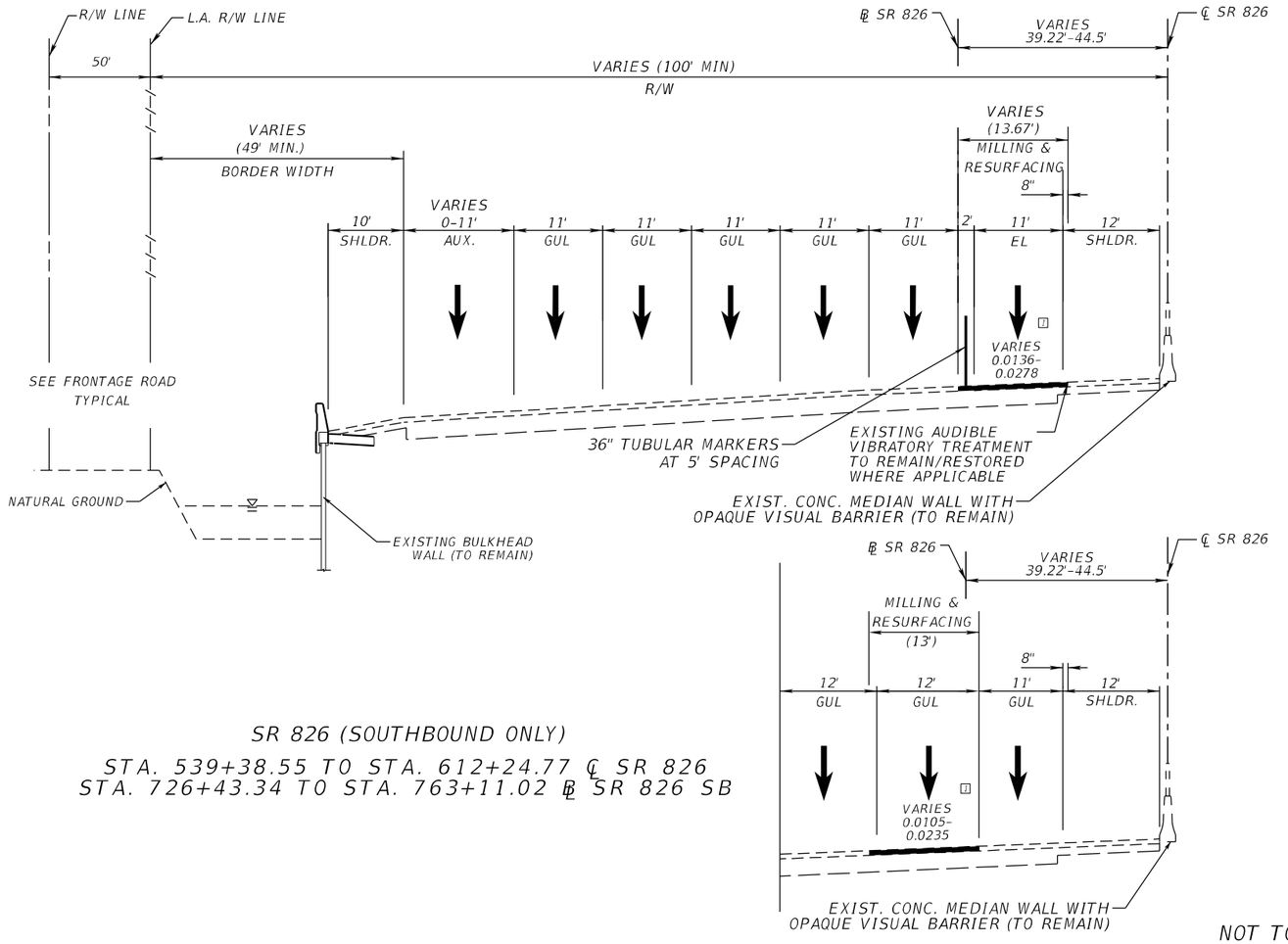
(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION:
1. LANE WIDTH

DESIGN VARIATION:
1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 6



SR 826 (SOUTHBOUND ONLY)

STA. 539+38.55 TO STA. 612+24.77 ℄ SR 826
STA. 726+43.34 TO STA. 763+11.02 ℄ SR 826 SB

*STA 734+11.32 TO STA 763+11.02

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	7

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

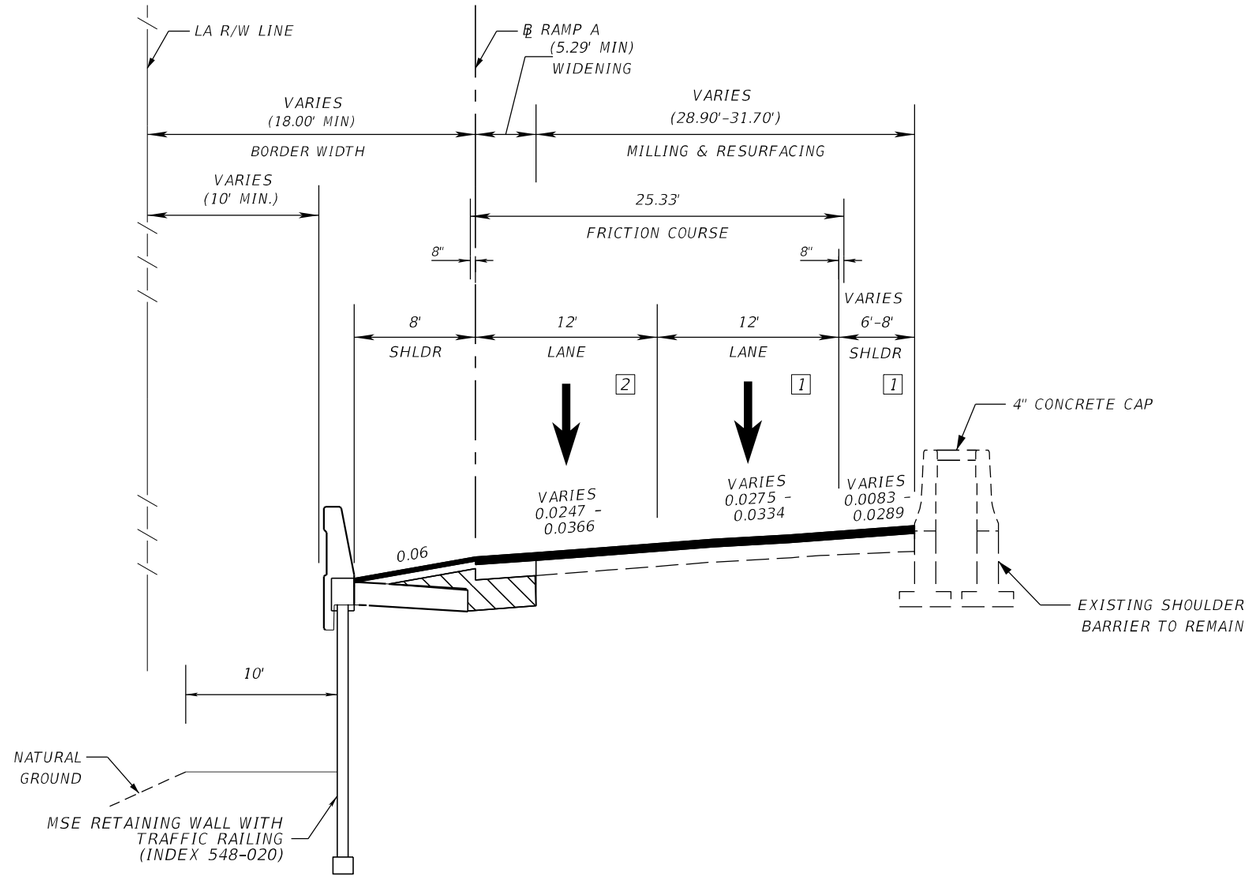
(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. BORDER WIDTH
2. SHOULDER WIDTH

TYPICAL SECTION No. 7



NW 74TH ST SB OFF-RAMP (87260399)

STA 3454+45.55 TO STA 3462+13.58

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE RANGE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 40 MPH
POSTED SPEED = 30 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	8

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
(X) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
(X) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
( ) LOCAL

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

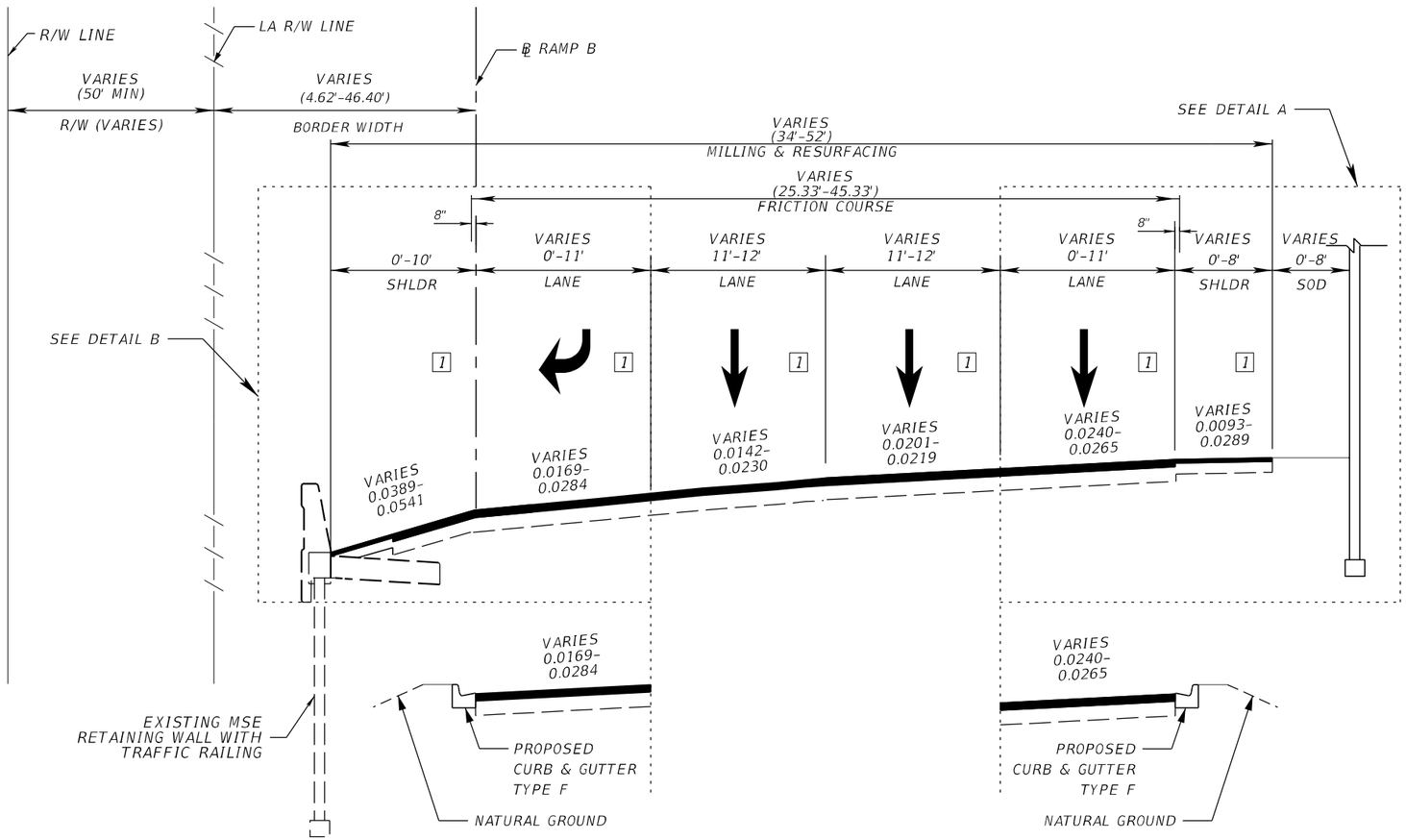
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. BORDER WIDTH

TYPICAL SECTION No. 8



*STA 6555+34.91 TO STA 6557+03.35
DETAIL B

*STA 6553+67.86 TO STA 6555+34.91
DETAIL A

NW 103RD ST. SB OFF-RAMP (87260355)

STA 6543+91.20 TO STA 6557+03.35

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 40 MPH
POSTED SPEED = 30 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	9

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
(X) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
(X) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
( ) LOCAL

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

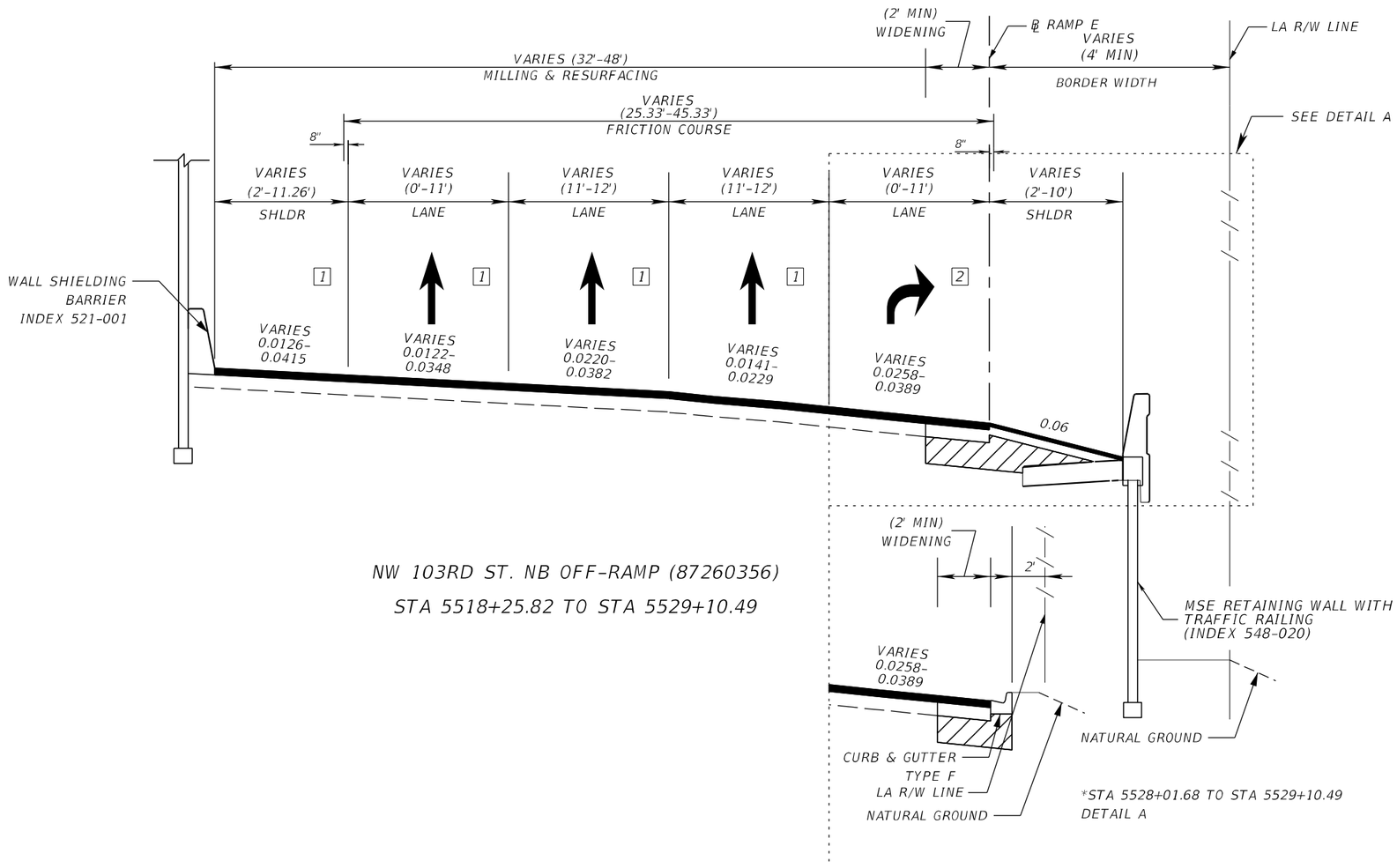
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. BORDER WIDTH
2. SHOULDER WIDTH

TYPICAL SECTION No. 9



NW 103RD ST. NB OFF-RAMP (87260356)

STA 5518+25.82 TO STA 5529+10.49

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 40 MPH
POSTED SPEED = 30 MPH

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES (VALUE RANGE IS SHOWN)
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE RANGE IS SHOWN

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	10

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

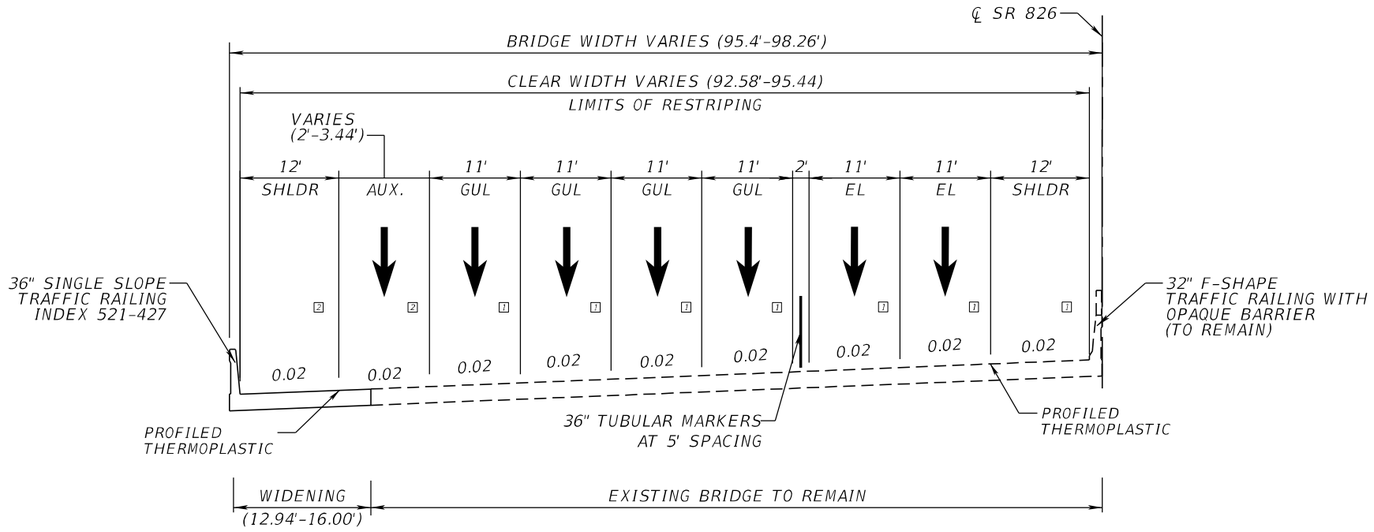
DESIGN EXCEPTION:

1. LANE WIDTH

DESIGN VARIATION:

1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 10



SR 826 SB OVER NW 74TH STREET, BRIDGE NO. 870964

STA. 435+50.81 TO STA. 437+29.87

APPROACH SLABS
STA 435+20.55 TO STA 435+50.81
STA 437+29.87 TO STA 437+54.21

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	11

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

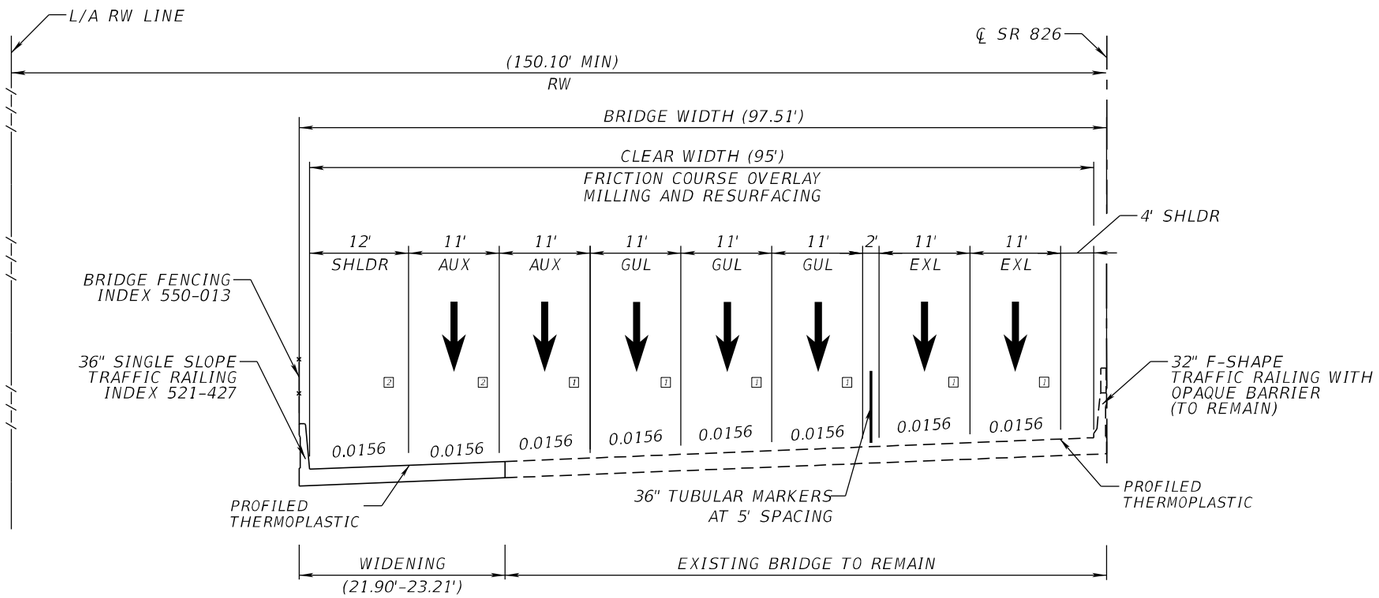
DESIGN EXCEPTION:

1. LANE WIDTH & SHOULDER WIDTH

DESIGN VARIATION:

1. VERTICAL CLEARNCE
2. EXPRESS LANE BUFFER SEPARATION WIDTH
3. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 11



SR 826 SB OVER METRORAIL, BRIDGE NO. 870257

STA. 446+07.24 TO STA. 446+63.81

APPROACH SLABS
STA 445+72.21 TO STA 446+07.24
STA 446+63.81 TO STA 446+98.06

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	12

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

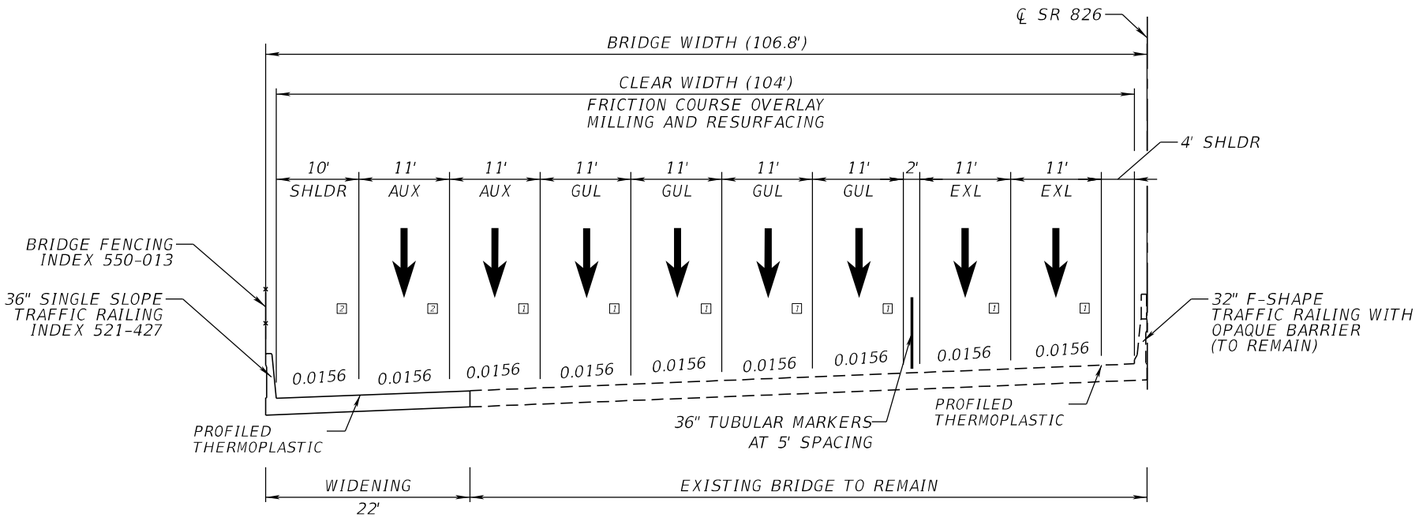
DESIGN EXCEPTION:

1. LANE WIDTH & SHOULDER WIDTH
2. VERTICAL CLEARANCE

DESIGN VARIATION:

1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 12



SR 826 SB OVER FEC RR, BRIDGE NO. 870258

STA. 462+17.94 TO STA. 463+67.36

APPROACH SLABS
STA 461+91.73 TO STA 462+17.94
STA 463+67.36 TO STA 463+93.73

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	13

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

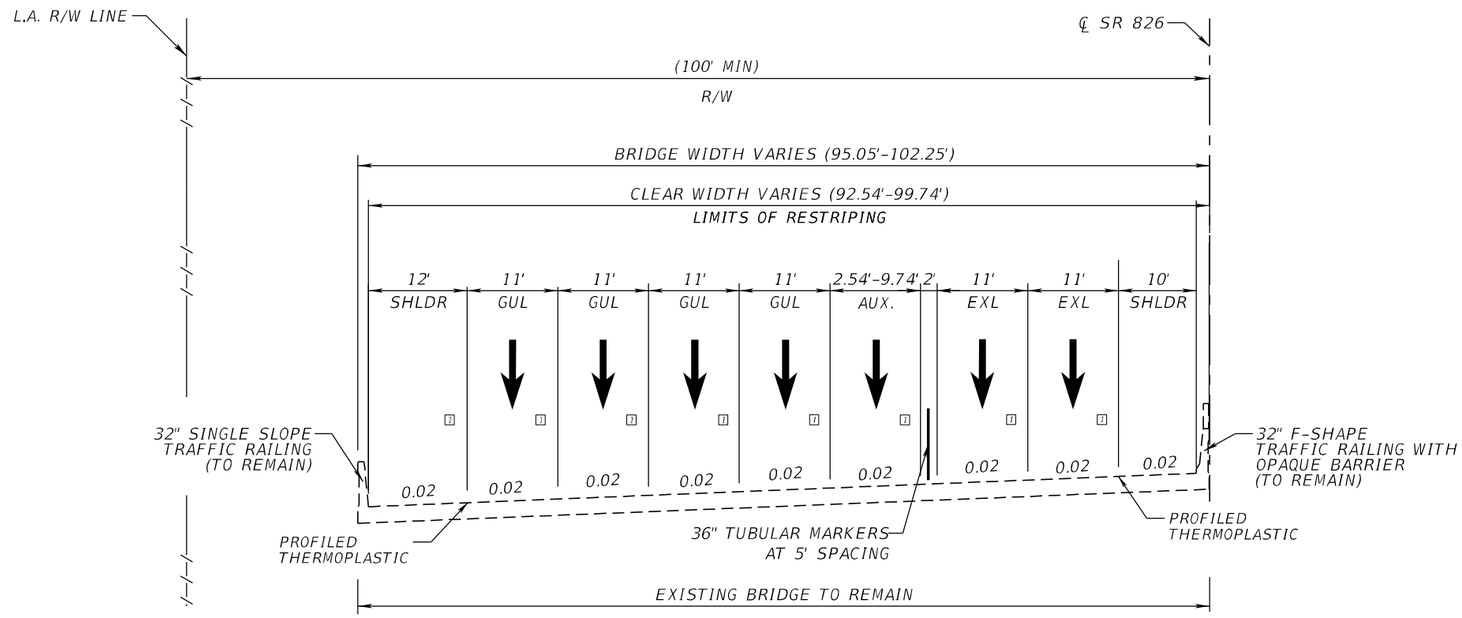
DESIGN EXCEPTION:

1. LANE WIDTH

DESIGN VARIATION:

1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 13



SR 826 SB OVER S. RIVER DR./MIAMI CANAL /OKEECHOBEE ROAD, BRIDGE NO. 870975

STA. 481+20.39 TO STA. 485+91.26

APPROACH SLABS
STA 481+20.25 TO STA 481+20.39
STA 485+91.26 TO STA 485+91.42

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	14

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
(X) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
(X) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
( ) LOCAL

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

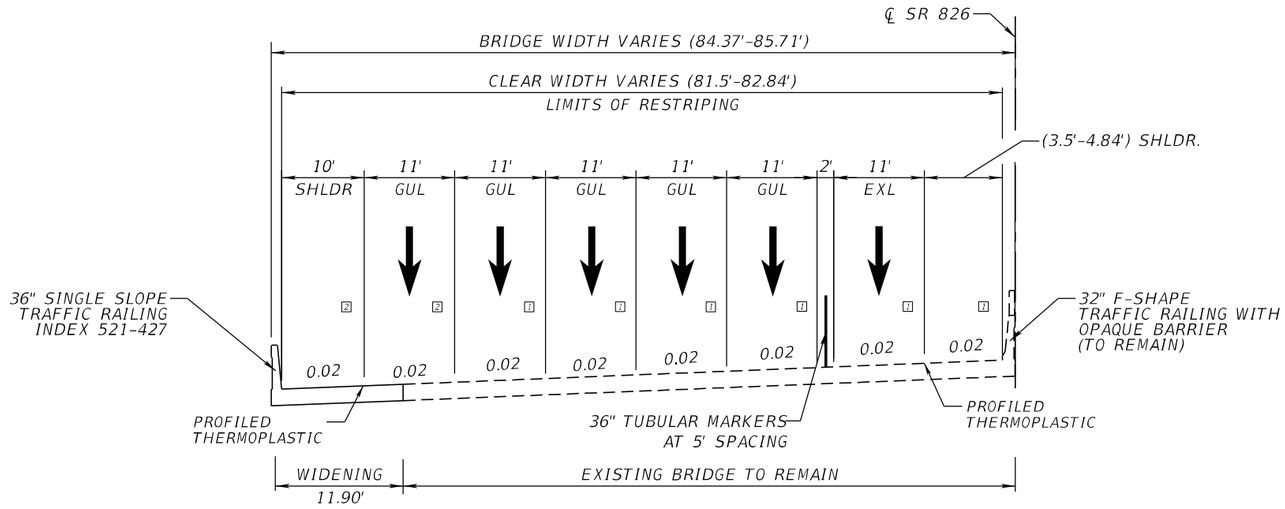
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION:
1. LANE WIDTH & SHOULDER WIDTH

DESIGN VARIATION:
1. SHOULDER WIDTH
2. EXPRESS LANE BUFFER SEPARATION WIDTH
3. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 14



SR 826 SB OVER NW 103RD STREET, BRIDGE NO. 870757

STA. 529+96.72 TO STA. 532+28.78

APPROACH SLABS
STA 529+70.69 TO STA 529+96.72
STA 532+28.78 TO STA 532+48.86

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	15

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
(X) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
(X) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
( ) LOCAL

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

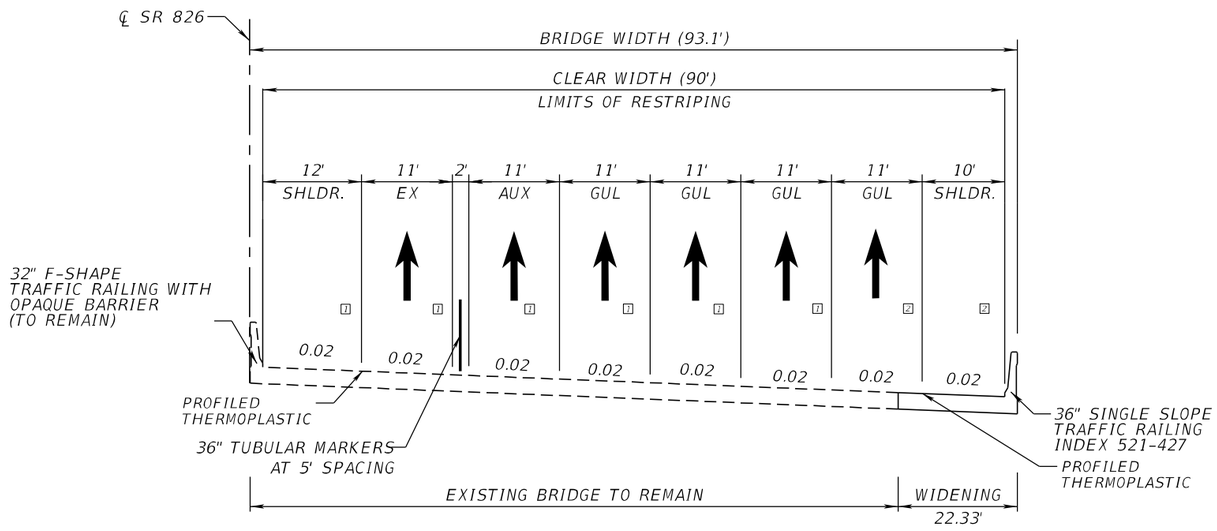
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION:
1. LANE WIDTH

DESIGN VARIATION:
1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 15



SR 826 NB OVER NW 103RD STREET, BRIDGE NO. 870995

STA. 529+96.72 TO STA. 532+28.78 ℄ SR 826

APPROACH SLABS
STA 529+70.69 TO STA 529+96.72
STA 532+28.78 TO STA 532+48.86

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01
2. MATCH ADJACENT LANE CROSS SLOPE. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	16

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

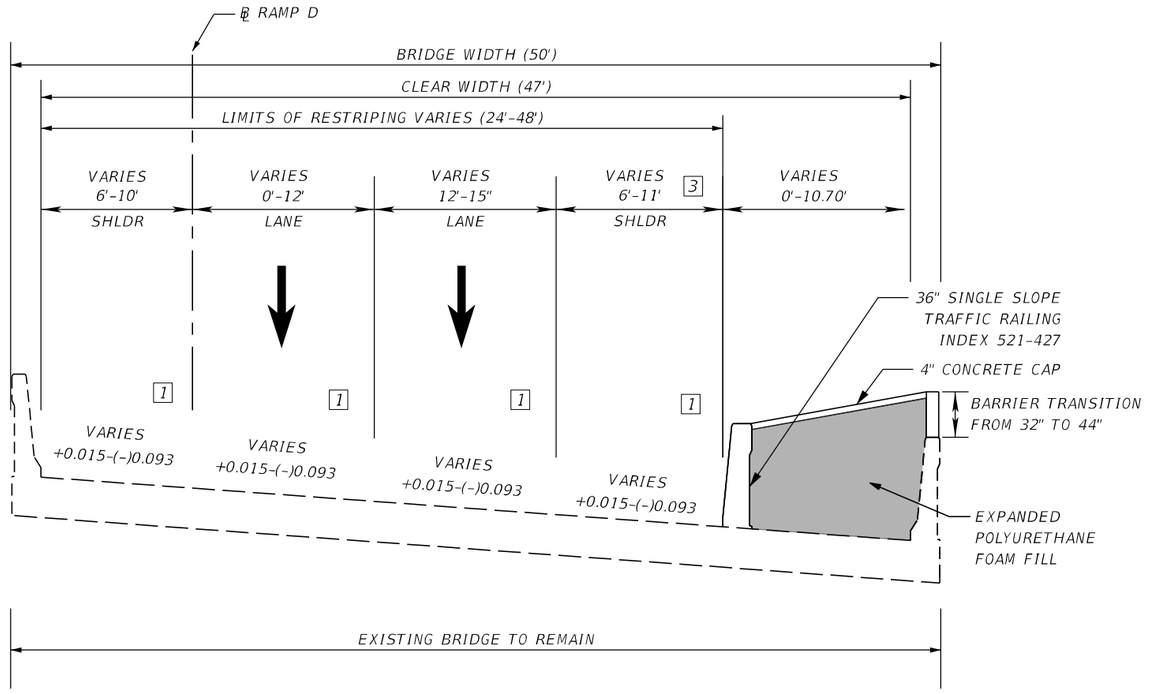
(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

TYPICAL SECTION No. 16



NW 103RD ST. SB FLYOVER ON-RAMP, BRIDGE NO. 870757

STA 4534+72.37 TO STA 4538+08.15

NOT TO SCALE

NOTE:
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01. VALUE RANGE IS SHOWN
2. BRIDGE IS SUPERELEVATED
3. SHOULDER WIDTH NEEDED TO MEET STOPPING SIGHT DISTANCE

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH (25 MPH ADVISORY)

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	17

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

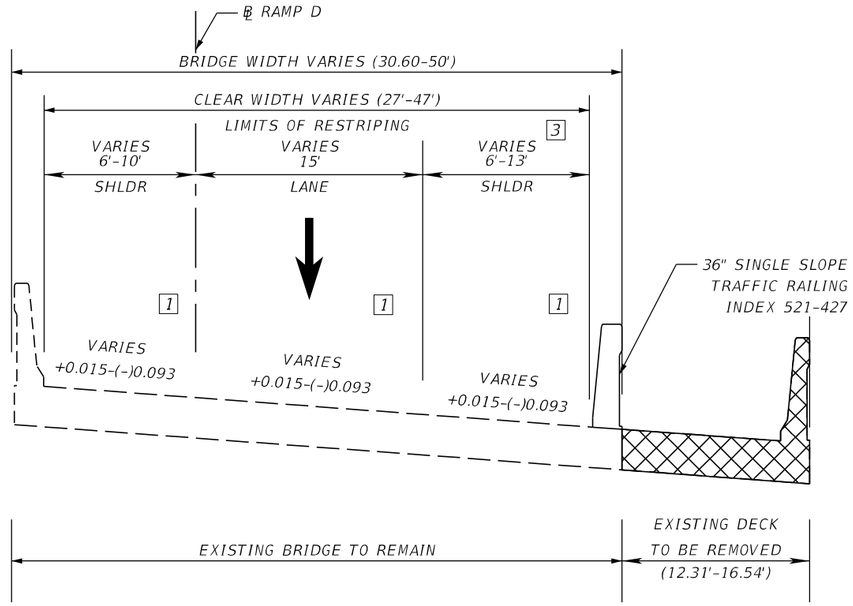
(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

TYPICAL SECTION No. 17



NW 103RD ST. SB FLYOVER ON-RAMP, BRIDGE NO. 870757

STA 4538+08.15 TO STA 4546+20.21

NOT TO SCALE

NOTE:
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01. VALUE RANGE IS SHOWN
2. BRIDGE IS SUPERELEVATED
3. SHOULDER WIDTH NEEDED TO MEET STOPPING SIGHT DISTANCE

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH (25 MPH ADVISORY)

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	18

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
(X) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
(X) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
( ) LOCAL

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

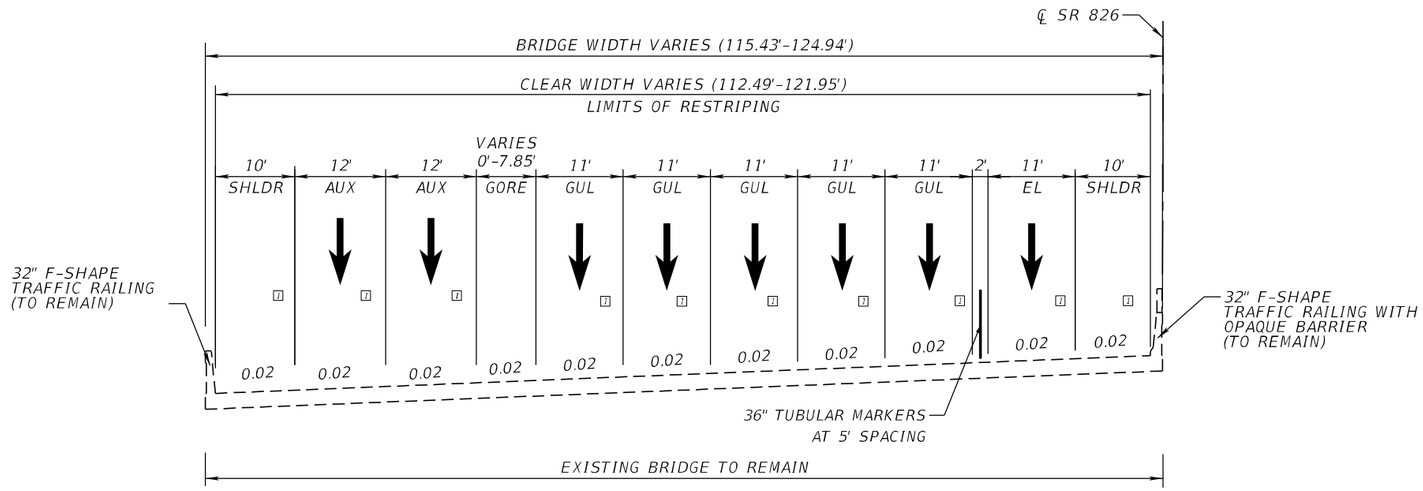
CRITERIA

(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION
1. LANE WIDTH
DESIGN VARIATION
1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 18



SR 826 SB OVER LITTLE RIVER CANAL, BRIDGE NO. 870758

STA. 540+84.25 TO STA. 541+69.15

APPROACH SLABS
STA 540+64.30 TO STA 540+84.25
STA 541+69.15 TO STA 541+89.18

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
[1.] MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	19

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X)	NATIONAL HIGHWAY SYSTEM
(X)	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X)	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

CRITERIA

(X)	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
( )	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

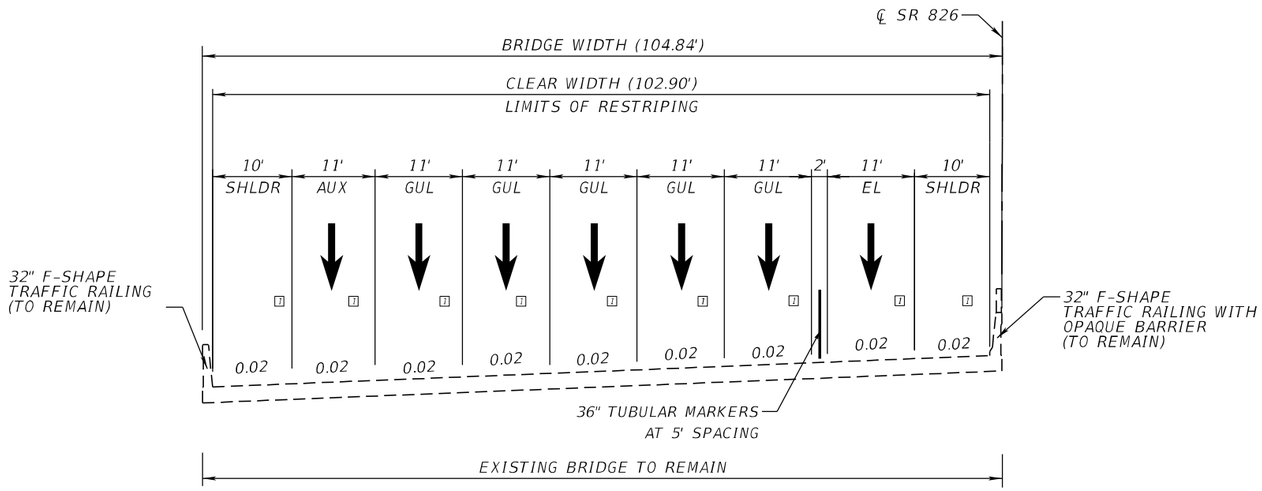
DESIGN EXCEPTION

1. LANE WIDTH

DESIGN VARIATION

1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 19



SR 826 SB OVER W 60TH STREET, BRIDGE NO. 870957

STA. 567+82.06 TO STA. 568+87.97

APPROACH SLABS
STA 567+62.08 TO STA 567+82.06
STA 568+87.97 TO STA 569+07.96

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	20

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	( )	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
(X)	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
(X)	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	( )	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

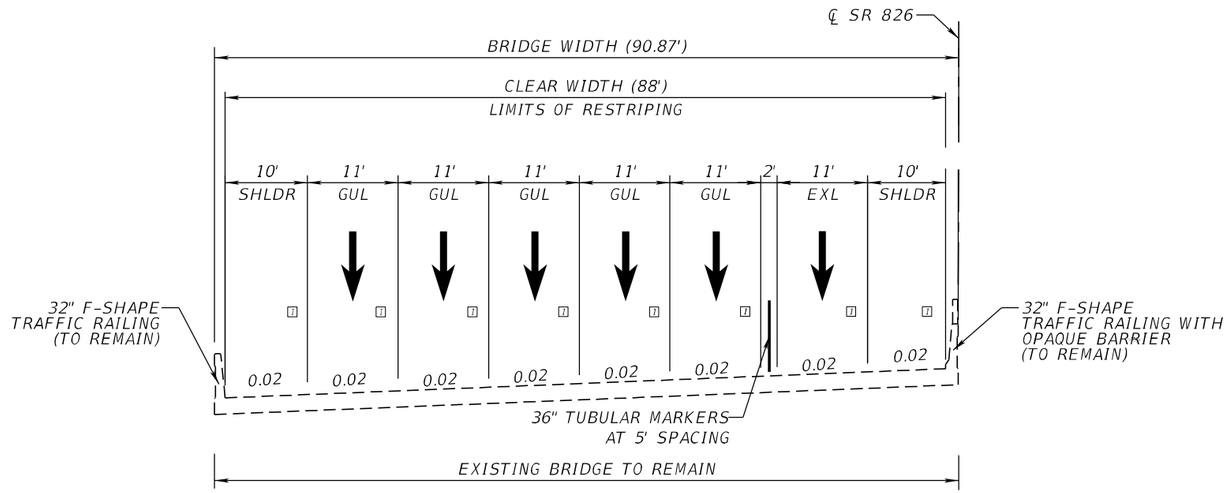
(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION:
1. LANE WIDTH

DESIGN VARIATION:
1. EXPRESS LANE BUFFER SEPARATION WIDTH
2. EXPRESS LANES TUBULAR MARKER COLOR

TYPICAL SECTION No. 20



SR 826 SB OVER NW 122ND STREET, BRIDGE NO. 870766

STA. 593+16.24 TO STA. 594+71.22

APPROACH SLABS
STA 592+96.23 TO STA 593+16.24
STA 594+71.22 TO STA 594+91.41

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	21

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
(X) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
(X) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
( ) LOCAL

HIGHWAY SYSTEM

(X) NATIONAL HIGHWAY SYSTEM
(X) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

(X) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

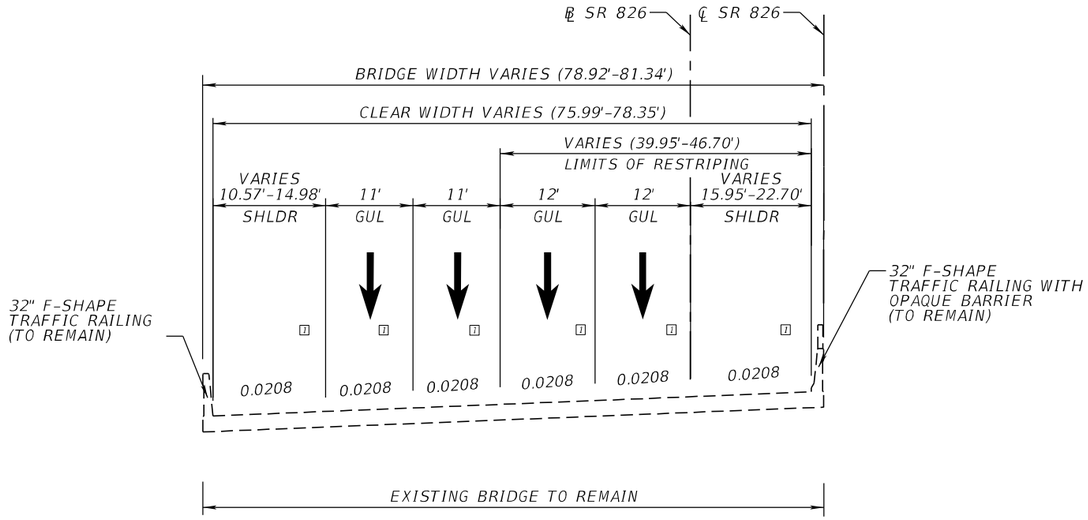
CRITERIA

(X) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
( ) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN EXCEPTION
1. LANE WIDTH
DESIGN VARIATION
1. EXPRESS LANE BUFFER SEPARATION WIDTH

TYPICAL SECTION No. 21



SR 826 SB OVER NW 138TH STREET, BRIDGE NO. 870467

STA. 757+71.93 TO STA. 758+67.78 ℄ SR 826 SB

APPROACH SLABS
STA 757+36.72 TO STA 757+71.93 ℄ SR 826 SB
STA 758+67.78 TO STA 759+02.99 ℄ SR 826 SB

NOT TO SCALE

LEGEND:
EL = EXPRESS LANES
GUL = GENERAL USE LANES
AUX = AUXILARY LANES

NOTES;
1. MATCH EXISTING CROSS SLOPES. CROSS SLOPES OBTAINED FROM FPID 432687-1-52-01. VALUE IS SHOWN

TRAFFIC DATA

CURRENT YEAR = 2020 AADT = 52,280 - 127,060
ESTIMATED OPENING YEAR = 2022 AADT = N/A
ESTIMATED DESIGN YEAR = 2036 AADT = 381,000
K = 7.59% D = 50.0% T = 6.6% (24 HOUR)
DESIGN HOUR T = 6.6%
DESIGN SPEED = 60 MPH
POSTED SPEED = 55 MPH

FINANCIAL PROJECT ID	SHEET NO.
447165-1-52-01	22

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

- ( ) NATIONAL HIGHWAY SYSTEM
- ( ) STRATEGIC INTERMODAL SYSTEM
- (X) STATE HIGHWAY SYSTEM
- ( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

- ( ) 1 - FREEWAY
- ( ) 2 - RESTRICTIVE w/Service Roads
- ( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
- ( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
- ( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
- ( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
- ( ) 7 - BOTH MEDIAN TYPES

CRITERIA

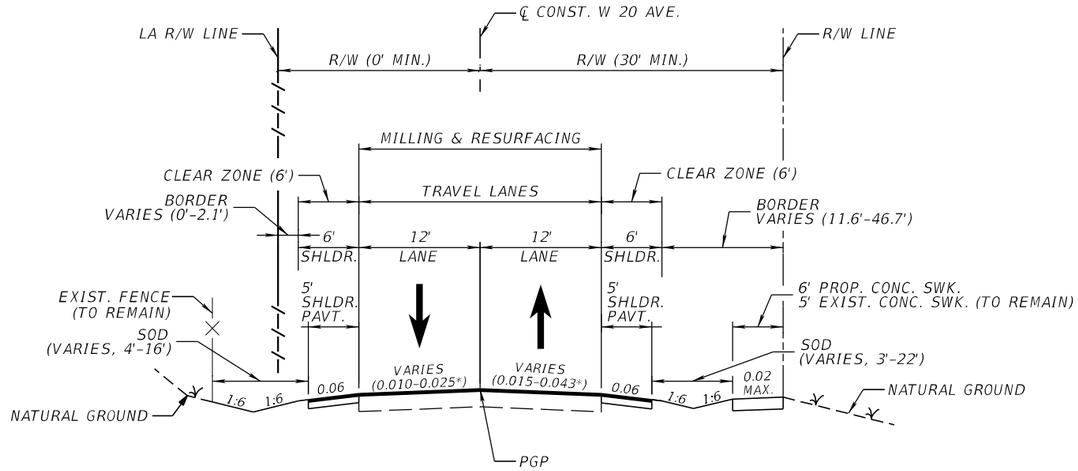
- ( ) NEW CONSTRUCTION / RECONSTRUCTION
- ( ) RESURFACING (LA FACILITIES)
- (X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. CROSS SLOPE
2. BORDER WIDTH
3. HORIZONTAL CURVE RADIUS, HORIZONTAL CURVE LENGTH AND SUPERELEVATION
4. GUARDRAIL LATERAL OFFSET

TYPICAL SECTION No. 22



EAST FRONTAGE ROAD/W 20TH AVENUE (SECTION 87260151)
STA. 200+12.23 TO STA. 214+41.08

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE IS SHOWN. MAX. CROSS SLOPE AT SUPERELEVATED SECTIONS:
- 0.091 (RIGHT LANE)
- 0.095 (LEFT LANE)

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 2,028
ESTIMATED OPENING YEAR = 2024 AADT = 2,100
ESTIMATED DESIGN YEAR = 2044 AADT = 2,500
K = 10.21% D = 64.5% T = 5.47% (24 HOUR)
DESIGN HOUR T = 5.47%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441830-1-52-01	23

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

- ( ) NATIONAL HIGHWAY SYSTEM
- ( ) STRATEGIC INTERMODAL SYSTEM
- (X) STATE HIGHWAY SYSTEM
- ( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

- ( ) 1 - FREEWAY
- ( ) 2 - RESTRICTIVE w/Service Roads
- ( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
- ( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
- ( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
- ( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
- ( ) 7 - BOTH MEDIAN TYPES

CRITERIA

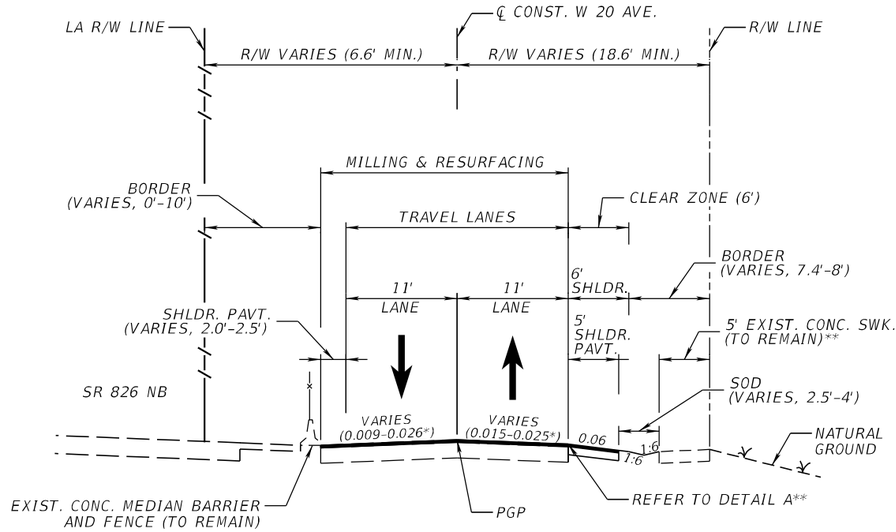
- ( ) NEW CONSTRUCTION / RECONSTRUCTION
- ( ) RESURFACING (LA FACILITIES)
- (X) RRR (ARTERIALS & COLLECTORS)

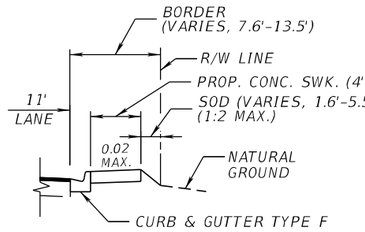
POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. LANE WIDTH
2. CROSS SLOPE
3. SHOULDER WIDTH
4. BORDER WIDTH
5. HORIZONTAL CURVE RADIUS, HORIZONTAL CURVE LENGTH AND SUPERELEVATION
6. BICYCLE FACILITIES
7. SIDEWALK WIDTH

TYPICAL SECTION No. 23





** DETAIL A
STA. 214+80.19 TO STA. 216+84.87 RT

EAST FRONTAGE ROAD/W 20TH AVENUE (SECTION 87260151)
STA. 214+41.08 TO STA. 220+88.21 LT,
STA. 214+41.08 TO STA. 223+61.91 RT

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN. MAX. CROSS SLOPE AT SUPERELEVATED SECTIONS:
- 0.088 (RIGHT LANE)
- 0.096 (LEFT LANE)

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 2,028
ESTIMATED OPENING YEAR = 2024 AADT = 2,100
ESTIMATED DESIGN YEAR = 2044 AADT = 2,500
K = 10.21% D = 64.5% T = 5.47% (24 HOUR)
DESIGN HOUR T = 5.47%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441830-1-52-01	24

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

- ( ) NATIONAL HIGHWAY SYSTEM
- ( ) STRATEGIC INTERMODAL SYSTEM
- (X) STATE HIGHWAY SYSTEM
- ( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

- ( ) 1 - FREEWAY
- ( ) 2 - RESTRICTIVE w/Service Roads
- ( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
- ( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
- ( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
- ( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
- ( ) 7 - BOTH MEDIAN TYPES

CRITERIA

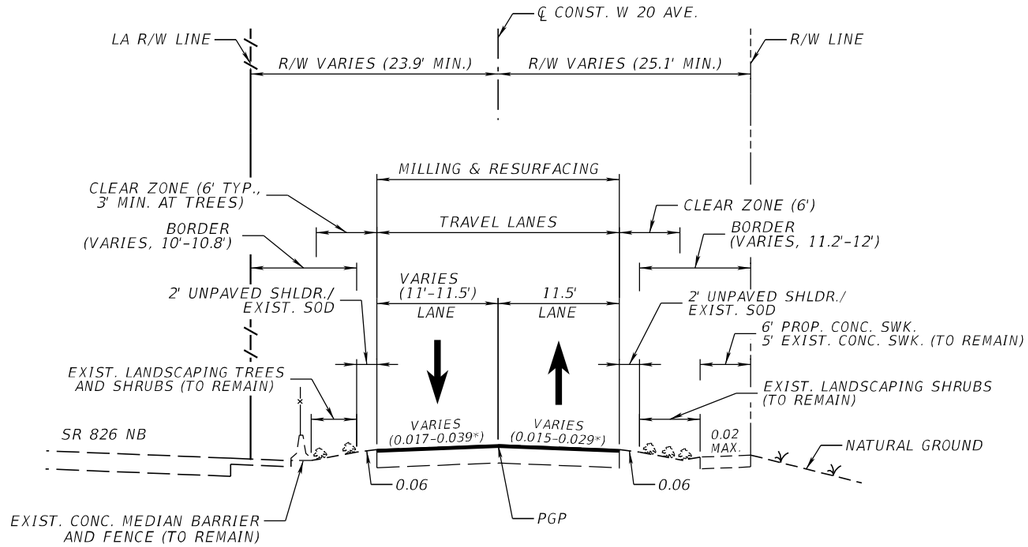
- ( ) NEW CONSTRUCTION / RECONSTRUCTION
- ( ) RESURFACING (LA FACILITIES)
- (X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. LANE WIDTH
2. CROSS SLOPE
3. SHOULDER WIDTH
4. BICYCLE FACILITIES
5. LATERAL OFFSET

TYPICAL SECTION No. 24



EAST FRONTAGE ROAD/W 20TH AVENUE (SECTION 87260151)
STA. 220+88.21 TO STA. 237+40.00 LT,
STA. 223+61.91 TO STA. 237+40.00 RT

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 2,028
ESTIMATED OPENING YEAR = 2024 AADT = 2,100
ESTIMATED DESIGN YEAR = 2044 AADT = 2,500
K = 10.21% D = 64.5% T = 5.47% (24 HOUR)
DESIGN HOUR T = 5.47%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441830-1-52-01	25

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) N/A : L.A. FACILITY
(X) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
( ) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
(X) LOCAL

HIGHWAY SYSTEM

( ) NATIONAL HIGHWAY SYSTEM
( ) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

( ) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

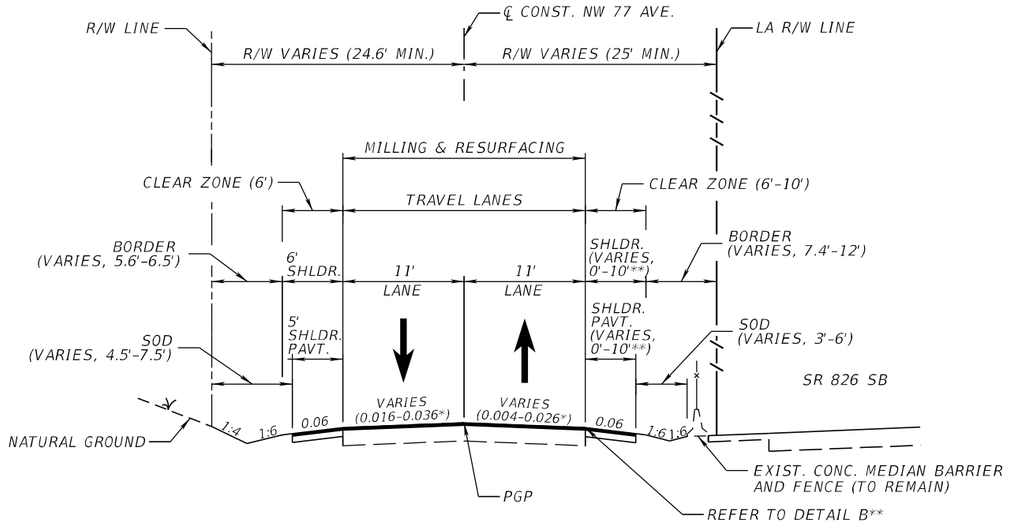
( ) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
(X) RRR (ARTERIALS & COLLECTORS)

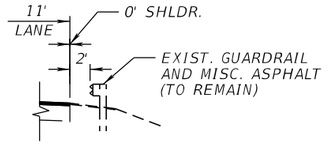
POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. LANE WIDTH
2. SHOULDER WIDTH
3. CROSS SLOPE
4. BORDER WIDTH
5. HORIZONTAL CURVE RADIUS, HORIZONTAL CURVE LENGTH AND SUPERELEVATION
6. GUARDRAIL LATERAL OFFSET

TYPICAL SECTION No. 25





** DETAIL B
STA. 700+12.04 TO STA. 701+26.52 RT

WEST FRONTAGE ROAD/NW 77TH AVENUE (SECTION 87260152)
STA. 700+00.00 TO STA. 705+66.18 LT,
STA. 700+00.00 TO STA. 705+47.86 RT

*MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN. MAX. CROSS SLOPE AT SUPERELEVATED SECTIONS:
- 0.075 (RIGHT LANE)
- 0.093 (LEFT LANE)

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 3,621
ESTIMATED OPENING YEAR = 2024 AADT = 4,600
ESTIMATED DESIGN YEAR = 2044 AADT = 5,400
K = 8.38% D = 76.4% T = 4.64% (24 HOUR)
DESIGN HOUR T = 4.64%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH***

*** NO EXISTING SPEED LIMIT SIGNS.

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441830-1-52-01	26

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
(X) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
( ) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
( ) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
(X) LOCAL

HIGHWAY SYSTEM

( ) NATIONAL HIGHWAY SYSTEM
( ) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

( ) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

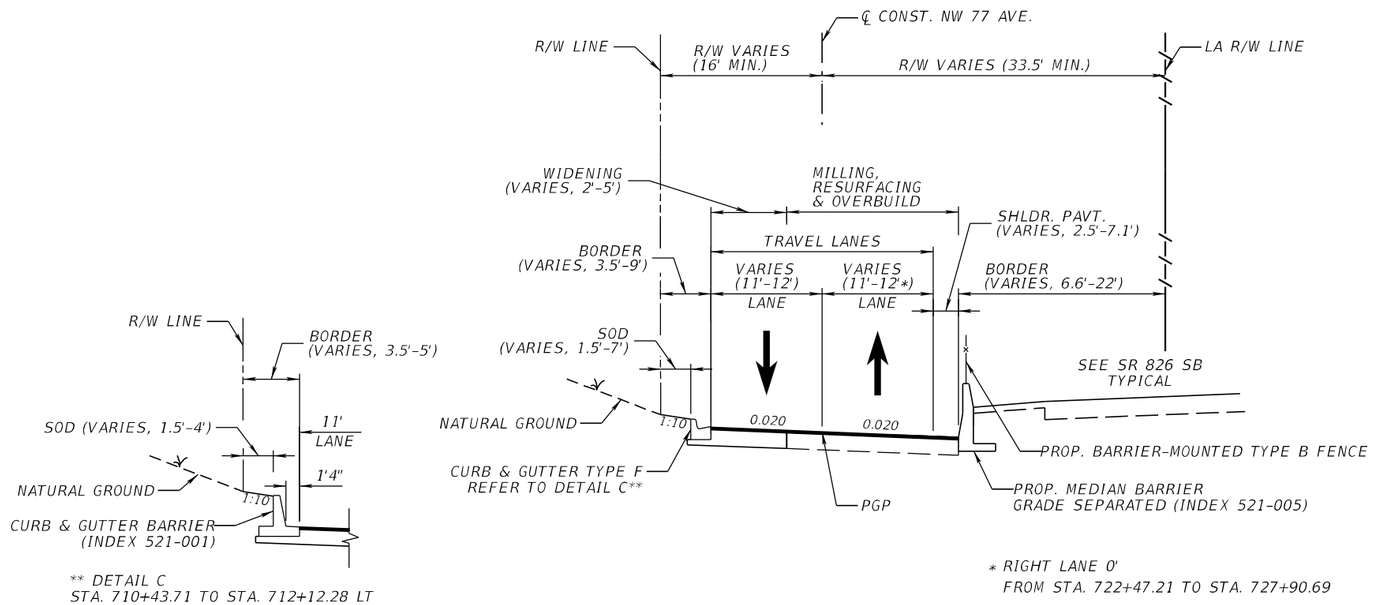
CRITERIA

( ) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
(X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION
1. LANE WIDTH
2. SHOULDER WIDTH
3. BORDER WIDTH
4. BICYCLE FACILITIES
5. MINIMUM OFFSET TO HAZARD ON TOP OF BARRIER WALL

TYPICAL SECTION No. 26



** DETAIL C
STA. 710+43.71 TO STA. 712+12.28 LT

* RIGHT LANE 0'
FROM STA. 722+47.21 TO STA. 727+90.69

WEST FRONTAGE ROAD/NW 77TH AVENUE (SECTION 87260152)
STA. 705+66.18 TO STA. 730+58.27 LT,
STA. 705+47.86 TO STA. 727+87.77 RT

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 3,621
ESTIMATED OPENING YEAR = 2024 AADT = 4,600
ESTIMATED DESIGN YEAR = 2044 AADT = 5,400
K = 8.38% D = 76.4% T = 4.64% (24 HOUR)
DESIGN HOUR T = 4.64%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH***

*** NO EXISTING SPEED LIMIT SIGNS.

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441830-1-52-01	27

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

( )	NATIONAL HIGHWAY SYSTEM
( )	STRATEGIC INTERMODAL SYSTEM
(X)	STATE HIGHWAY SYSTEM
( )	OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

( )	1 - FREEWAY
( )	2 - RESTRICTIVE w/Service Roads
( )	3 - RESTRICTIVE w/660 ft. Connection Spacing
( )	4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( )	5 - RESTRICTIVE w/440 ft. Connection Spacing
( )	6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( )	7 - BOTH MEDIAN TYPES

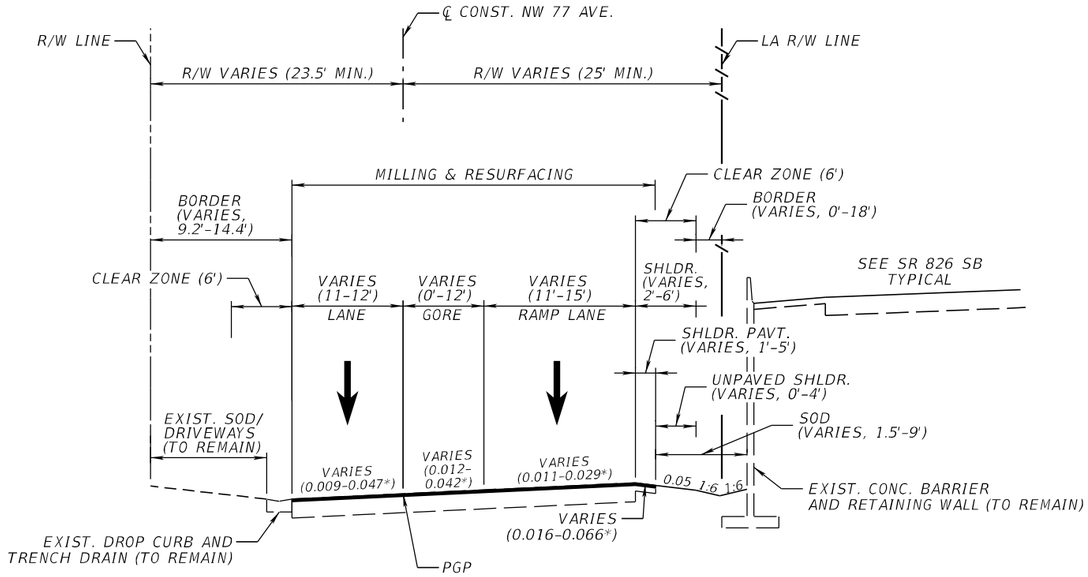
CRITERIA

( )	NEW CONSTRUCTION / RECONSTRUCTION
( )	RESURFACING (LA FACILITIES)
(X)	RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION
1. CROSS SLOPE
2. SHOULDER WIDTH
3. BORDER WIDTH
4. BICYCLE FACILITIES

TYPICAL SECTION No. 27



WEST FRONTAGE ROAD/NW 77TH AVENUE (SECTION 87260152)
STA. 727+87.77 TO STA. 737+12.00 RT,
STA. 730+58.27 TO STA. 737+12.00 LT

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 3,621
ESTIMATED OPENING YEAR = 2024 AADT = 4,600
ESTIMATED DESIGN YEAR = 2044 AADT = 5,400
K = 8.38% D = 76.4% T = 4.64% (24 HOUR)
DESIGN HOUR T = 4.64%
DESIGN SPEED = 40 MPH
POSTED SPEED = 30 MPH***

*** NO EXISTING SPEED LIMIT SIGNS.

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441830-1-52-01	28

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
(X) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE
( ) N/A : L.A. FACILITY

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
( ) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
(X) LOCAL

HIGHWAY SYSTEM

( ) NATIONAL HIGHWAY SYSTEM
( ) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

( ) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

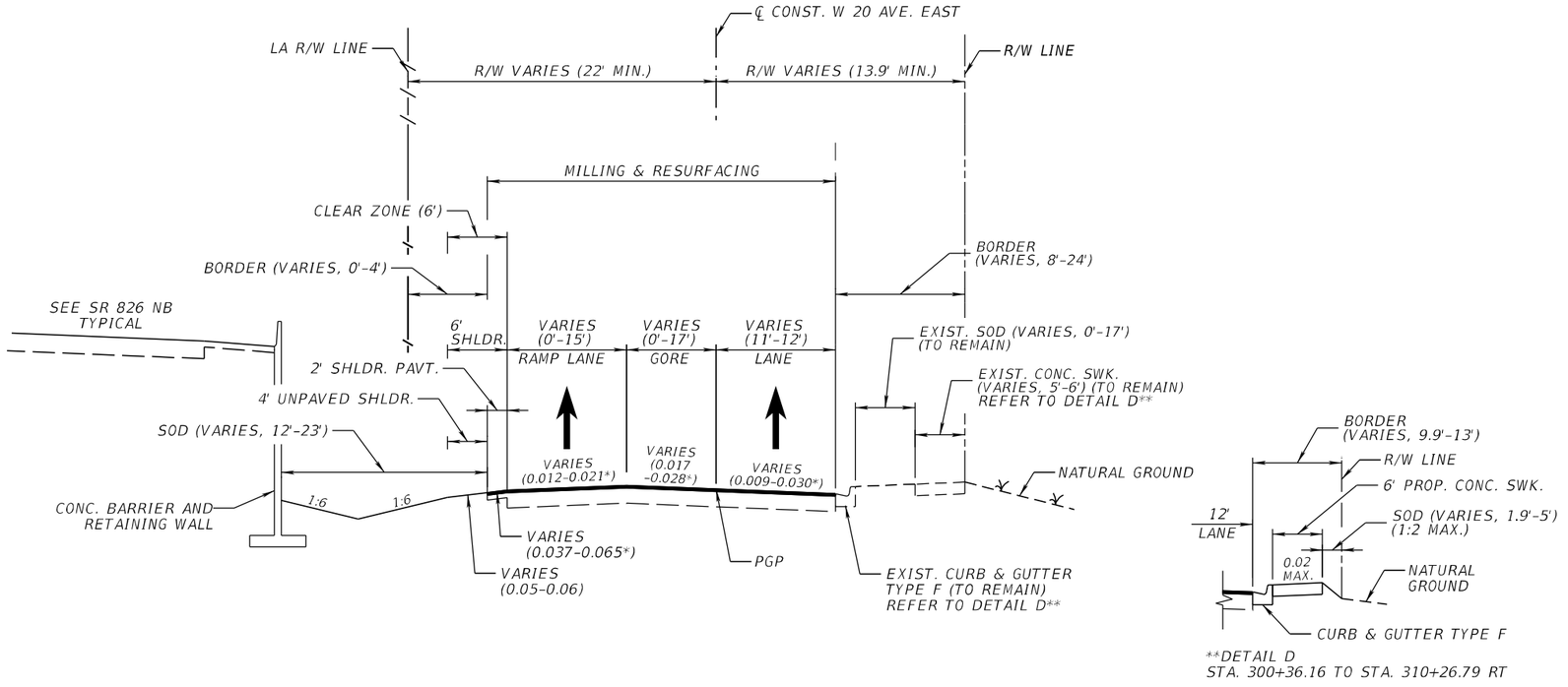
( ) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
(X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. CROSS SLOPE
2. BORDER WIDTH
3. BICYCLE FACILITIES

TYPICAL SECTION No. 28



**DETAIL D
STA. 300+36.16 TO STA. 310+26.79 RT

EAST FRONTAGE ROAD/W 20TH AVENUE EAST (SECTION 87260298)
STA 300+65.28 TO STA. 308+00.00 LT,
STA 300+65.28 TO STA. 310+26.79 RT

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 13,422
ESTIMATED OPENING YEAR = 2024 AADT = 14,000
ESTIMATED DESIGN YEAR = 2044 AADT = 16,600
K = 7.61% D = 71.2% T = 1.30% (24 HOUR)
DESIGN HOUR T = 1.30%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	29

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) N/A : L.A. FACILITY
(X) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
( ) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
(X) LOCAL

HIGHWAY SYSTEM

( ) NATIONAL HIGHWAY SYSTEM
( ) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

( ) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

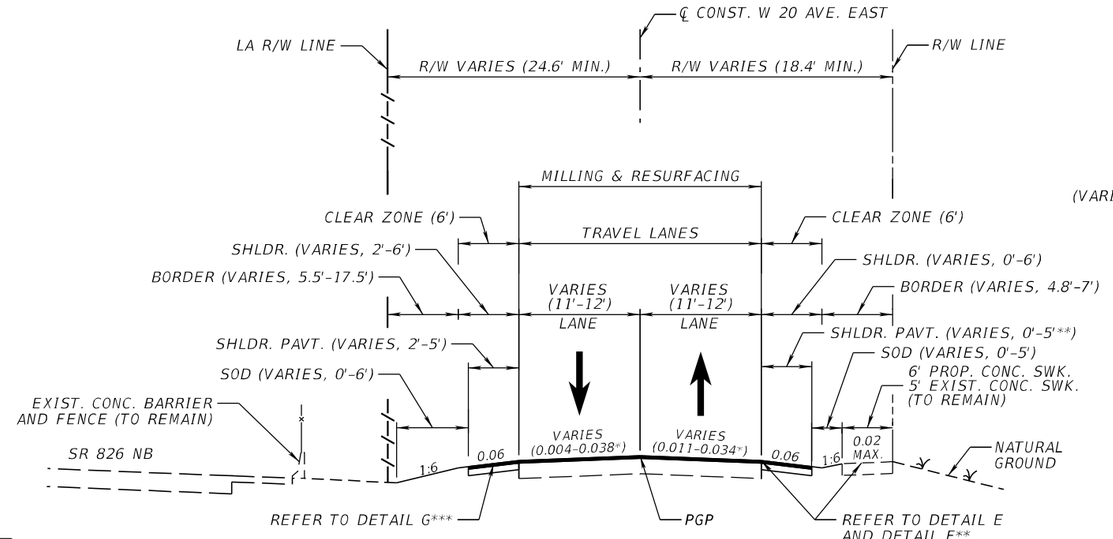
( ) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
(X) RRR (ARTERIALS & COLLECTORS)

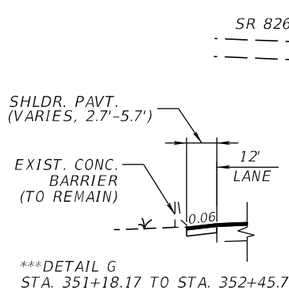
POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

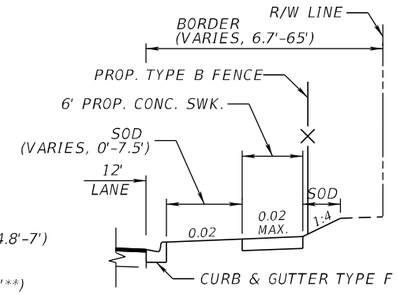
1. LANE WIDTH
2. CROSS SLOPE
3. SHOULDER WIDTH
4. BORDER WIDTH
5. HORIZONTAL CURVE RADIUS, HORIZONTAL CURVE LENGTH AND SUPERELEVATION
6. BICYCLE FACILITIES
7. LATERAL OFFSET
8. GUARDRAIL LATERAL OFFSET
9. SIDEWALK WIDTH

TYPICAL SECTION No. 29

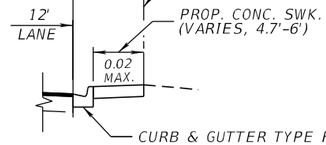




***DETAIL G
STA. 351+18.17 TO STA. 352+45.76 LT



**DETAIL E
STA. 354+62.91 TO STA. 355+83.22 RT



**DETAIL F
STA. 355+83.22 TO STA. 356+88.09 RT

EAST FRONTAGE ROAD/W 20TH AVENUE EAST (SECTION 87260298)
STA. 308+00.00 TO STA. 310+26.79 LT,
STA. 311+36.42 TO STA. 336+06.51,
STA. 339+47.22 TO STA. 363+26.20

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN. MAX. CROSS SLOPE AT SUPERELEVATED SECTIONS:
- 0.070 (RIGHT LANE)
- 0.067 (LEFT LANE)

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 13,422
ESTIMATED OPENING YEAR = 2024 AADT = 14,000
ESTIMATED DESIGN YEAR = 2044 AADT = 16,600
K = 7.61% D = 71.2% T = 1.30% (24 HOUR)
DESIGN HOUR T = 1.30%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	30

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

- ( ) NATIONAL HIGHWAY SYSTEM
- ( ) STRATEGIC INTERMODAL SYSTEM
- (X) STATE HIGHWAY SYSTEM
- ( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

- ( ) 1 - FREEWAY
- ( ) 2 - RESTRICTIVE w/Service Roads
- ( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
- ( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
- ( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
- ( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
- ( ) 7 - BOTH MEDIAN TYPES

CRITERIA

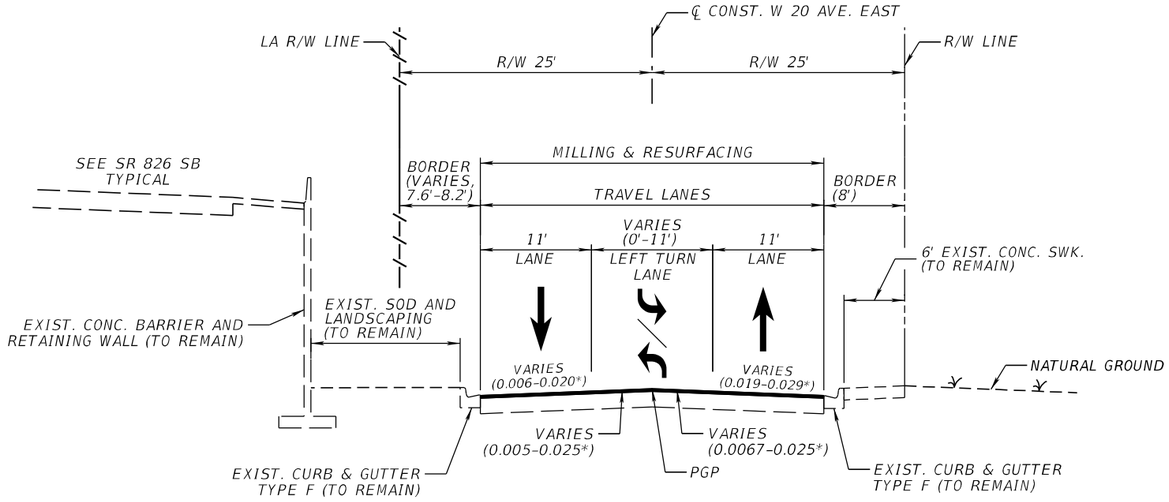
- ( ) NEW CONSTRUCTION / RECONSTRUCTION
- ( ) RESURFACING (LA FACILITIES)
- (X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. CROSS SLOPE
2. BICYCLE FACILITIES

TYPICAL SECTION No. 30



EAST FRONTAGE ROAD/W 20TH AVENUE EAST (SECTION 87260298)
STA. 336+06.51 TO STA. 339+47.22

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 13,422
ESTIMATED OPENING YEAR = 2024 AADT = 14,000
ESTIMATED DESIGN YEAR = 2044 AADT = 16,600
K = 7.61% D = 71.2% T = 1.30% (24 HOUR)
DESIGN HOUR T = 1.30%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	31

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

- ( ) NATIONAL HIGHWAY SYSTEM
- ( ) STRATEGIC INTERMODAL SYSTEM
- (X) STATE HIGHWAY SYSTEM
- ( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

- ( ) 1 - FREEWAY
- ( ) 2 - RESTRICTIVE w/Service Roads
- ( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
- ( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
- ( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
- ( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
- ( ) 7 - BOTH MEDIAN TYPES

CRITERIA

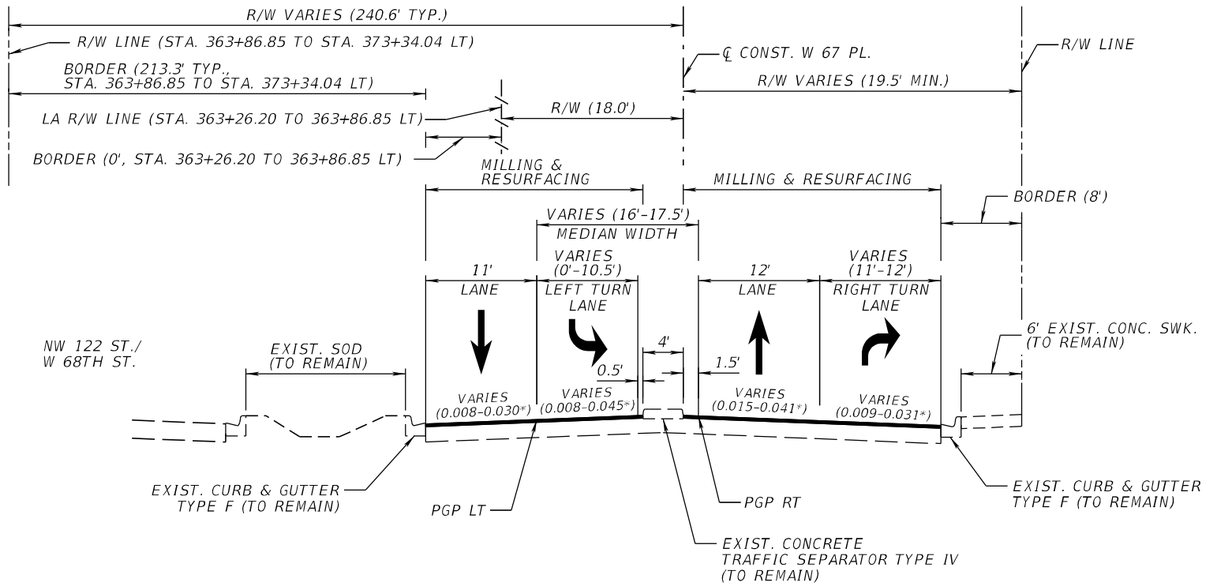
- ( ) NEW CONSTRUCTION / RECONSTRUCTION
- ( ) RESURFACING (LA FACILITIES)
- (X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. LANE WIDTH
2. CROSS SLOPE
3. HORIZONTAL CURVE RADIUS, HORIZONTAL CURVE LENGTH AND SUPERELEVATION
4. BICYCLE FACILITIES

TYPICAL SECTION No. 31



EAST FRONTAGE ROAD/W 67TH PLACE (SECTION 87260298)
STA. 363+26.20 TO STA. 373+34.04

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 13,422
ESTIMATED OPENING YEAR = 2024 AADT = 14,000
ESTIMATED DESIGN YEAR = 2044 AADT = 16,600
K = 7.61% D = 71.2% T = 1.30% (24 HOUR)
DESIGN HOUR T = 1.30%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH***

*** NO EXISTING SPEED LIMIT SIGNS. ADVISORY SPEED 20 MPH.

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	32

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

( ) NATIONAL HIGHWAY SYSTEM
( ) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

( ) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

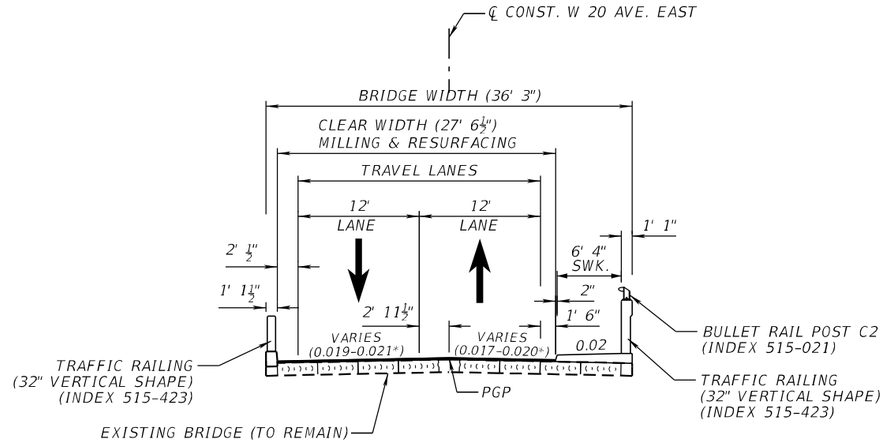
( ) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
(X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. SHOULDER WIDTH
2. BICYCLE FACILITIES
3. BRIDGE WIDTH

TYPICAL SECTION No. 32



EAST FRONTAGE ROAD/W 20TH AVENUE EAST (SECTION 87260298)
BRIDGE NO. 870570 OVER LITTLE RIVER CANAL (C-7)
STA. 310+26.79 TO STA. 311+36.42

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 13,422
ESTIMATED OPENING YEAR = 2024 AADT = 14,000
ESTIMATED DESIGN YEAR = 2044 AADT = 16,600
K = 7.61% D = 71.2% T = 1.30% (24 HOUR)
DESIGN HOUR T = 1.30%
DESIGN SPEED = 30 MPH
POSTED SPEED = 30 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	33

THE OFFICIAL RECORD OF THIS SHEET IS THE ELECTRONIC FILE DIGITALLY SIGNED AND SEALED UNDER RULE 61G15-23.004, F.A.C.

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

- ( ) NATIONAL HIGHWAY SYSTEM
- ( ) STRATEGIC INTERMODAL SYSTEM
- (X) STATE HIGHWAY SYSTEM
- ( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

- ( ) 1 - FREEWAY
- ( ) 2 - RESTRICTIVE w/Service Roads
- ( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
- ( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
- ( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
- ( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
- ( ) 7 - BOTH MEDIAN TYPES

CRITERIA

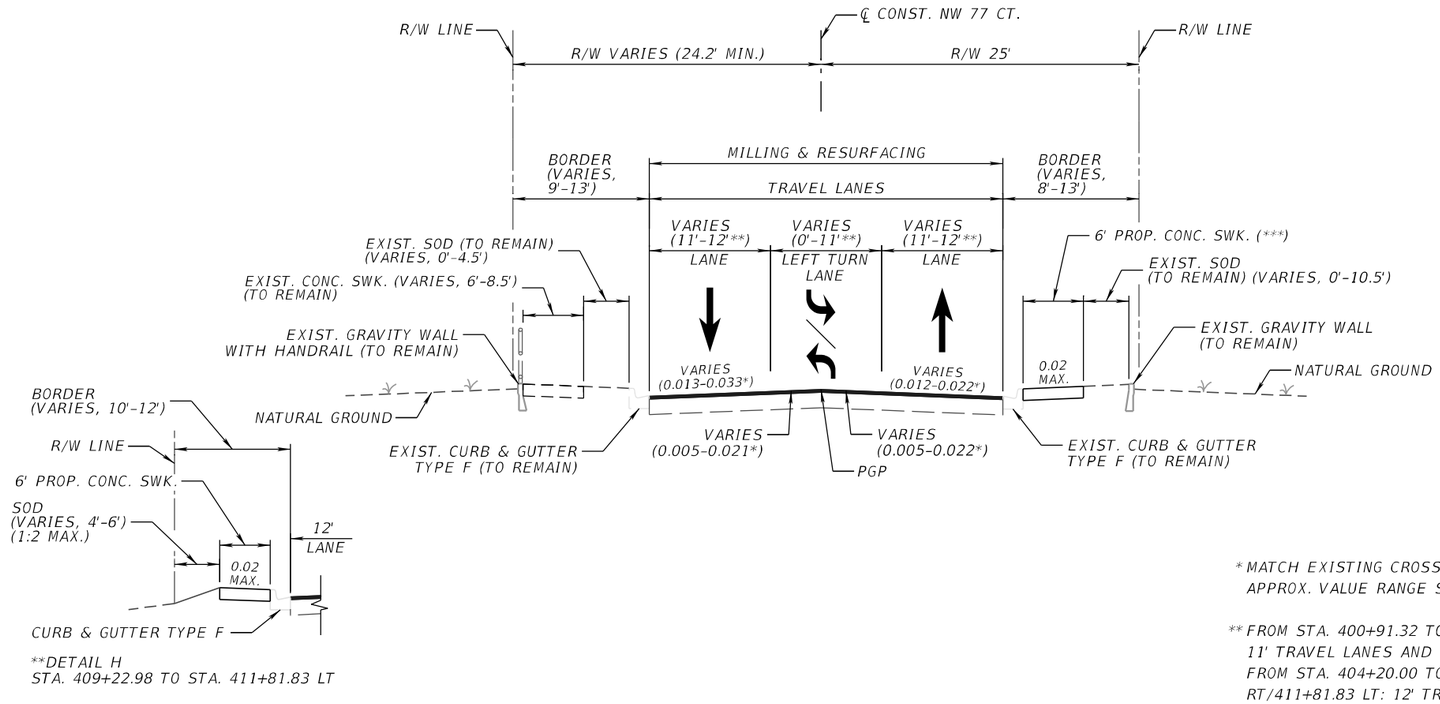
- ( ) NEW CONSTRUCTION / RECONSTRUCTION
- ( ) RESURFACING (LA FACILITIES)
- (X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. CROSS SLOPE
2. HORIZONTAL CURVE RADIUS, HORIZONTAL CURVE LENGTH AND SUPERELEVATION
3. BICYCLE FACILITIES

TYPICAL SECTION No. 33



**DETAIL H
STA. 409+22.98 TO STA. 411+81.83 LT

*MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

**FROM STA. 400+91.32 TO STA. 404+20.00: 11' TRAVEL LANES AND 11' LEFT TURN LANES . FROM STA. 404+20.00 TO STA. 409+55.73 RT/411+81.83 LT: 12' TRAVEL LANES.

***6' PROP. SWK. FROM STA. 400+91.32 TO STA. 403+86.95 RT, AND NO SWK. FROM STA. 403+86.95 TO STA. 409+55.73 RT.

WEST FRONTAGE ROAD/NW 77TH COURT (SECTION 87260506)
STA. 400+91.32 TO STA. 411+81.83 LT,
STA. 400+91.32 TO STA. 409+55.73 RT

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 9,322
ESTIMATED OPENING YEAR = 2024 AADT = 10,100
ESTIMATED DESIGN YEAR = 2044 AADT = 13,800
K = 8.30% D = 61.6% T = 2.54% (24 HOUR)
DESIGN HOUR T = 2.54%
DESIGN SPEED = 30 MPH
POSTED SPEED = 20 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	34

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

( ) NATIONAL HIGHWAY SYSTEM
( ) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

( ) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

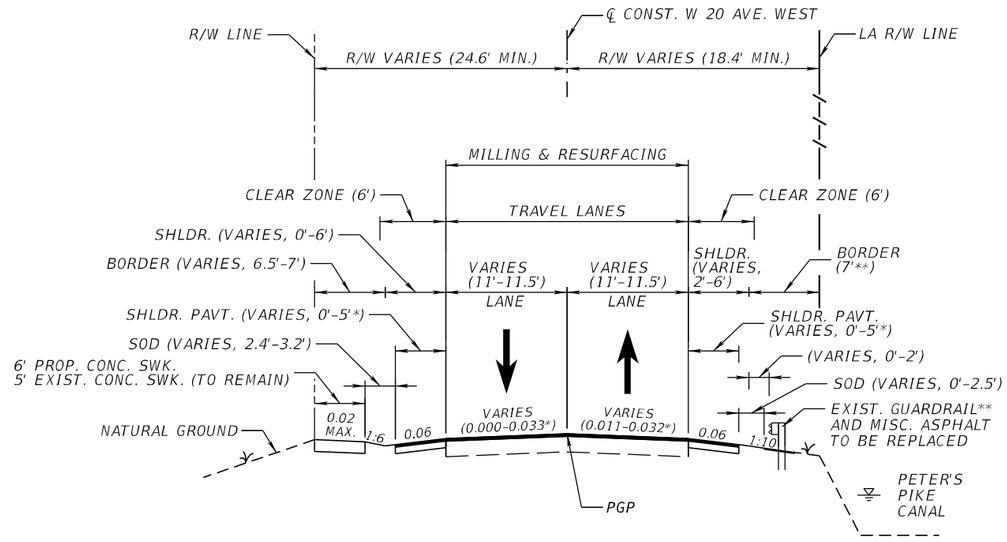
( ) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
(X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. LANE WIDTH
2. CROSS SLOPE
3. SHOULDER WIDTH
4. BORDER WIDTH
5. HORIZONTAL CURVE RADIUS, HORIZONTAL CURVE LENGTH AND SUPERELEVATION
6. BICYCLE FACILITIES
7. GUARDRAIL LATERAL OFFSET

TYPICAL SECTION No. 34



* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

** STA. 464+90 TO STA. 471+38.24, NO GUARDRAIL AND BORDER WIDTH VARIES 33'-55' RT

WEST FRONTAGE ROAD/W 20TH AVENUE WEST (SECTION 87260521)
STA. 409+55.73 TO STA. 411+81.83 RT,
STA. 412+71.84 TO STA. 436+30.54,
STA. 442+32.45 TO STA. 471+38.24

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 9,322
ESTIMATED OPENING YEAR = 2024 AADT = 10,100
ESTIMATED DESIGN YEAR = 2044 AADT = 13,800
K = 8.30% D = 61.6% T = 2.54% (24 HOUR)
DESIGN HOUR T = 2.54%
DESIGN SPEED = 35 MPH
POSTED SPEED = 35 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	35

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( )	C1 : NATURAL	(X)	C3C : SUBURBAN COMM.
( )	C2 : RURAL	( )	C4 : URBAN GENERAL
( )	C2T : RURAL TOWN	( )	C5 : URBAN CENTER
( )	C3R : SUBURBAN RES.	( )	C6 : URBAN CORE
( )	N/A : L.A. FACILITY		

FUNCTIONAL CLASSIFICATION

( )	INTERSTATE	( )	MAJOR COLLECTOR
( )	FREEWAY/EXPWY.	( )	MINOR COLLECTOR
( )	PRINCIPAL ARTERIAL	(X)	LOCAL
( )	MINOR ARTERIAL		

HIGHWAY SYSTEM

- ( ) NATIONAL HIGHWAY SYSTEM
- ( ) STRATEGIC INTERMODAL SYSTEM
- (X) STATE HIGHWAY SYSTEM
- ( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

- ( ) 1 - FREEWAY
- ( ) 2 - RESTRICTIVE w/Service Roads
- ( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
- ( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
- ( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
- ( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
- ( ) 7 - BOTH MEDIAN TYPES

CRITERIA

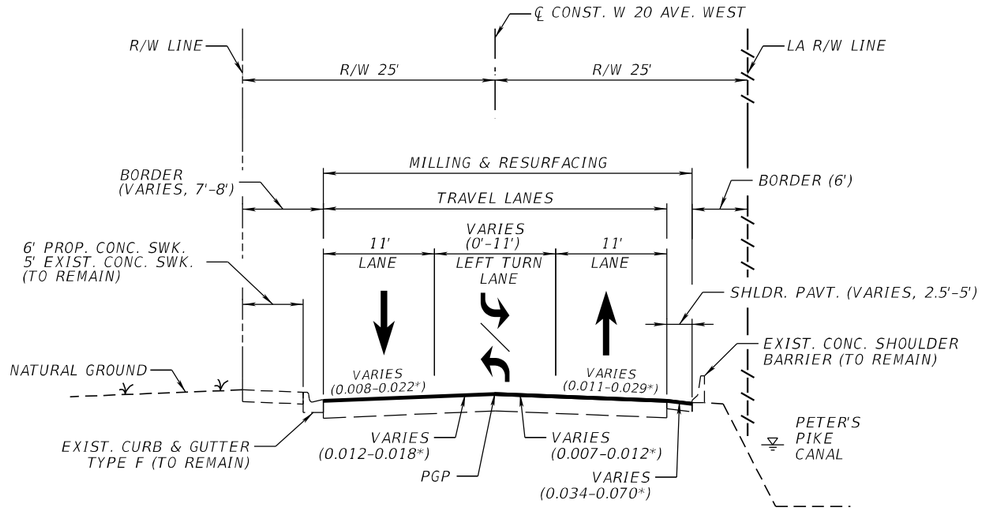
- ( ) NEW CONSTRUCTION / RECONSTRUCTION
- ( ) RESURFACING (LA FACILITIES)
- (X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. CROSS SLOPE
2. SHOULDER WIDTH
3. BORDER WIDTH
4. BICYCLE FACILITIES
5. LATERAL OFFSET

TYPICAL SECTION No. 35



WEST FRONTAGE ROAD/W 20TH AVENUE WEST (SECTION 87260521)
STA. 436+30.54 TO STA. 442+32.45

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 9,322
ESTIMATED OPENING YEAR = 2024 AADT = 10,100
ESTIMATED DESIGN YEAR = 2044 AADT = 13,800
K = 8.30% D = 61.6% T = 2.54% (24 HOUR)
DESIGN HOUR T = 2.54%
DESIGN SPEED = 35 MPH
POSTED SPEED = 35 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	36

PROJECT CONTROLS

CONTEXT CLASSIFICATION

( ) C1 : NATURAL
( ) C2 : RURAL
( ) C2T : RURAL TOWN
( ) C3R : SUBURBAN RES.
( ) N/A : L.A. FACILITY
(X) C3C : SUBURBAN COMM.
( ) C4 : URBAN GENERAL
( ) C5 : URBAN CENTER
( ) C6 : URBAN CORE

FUNCTIONAL CLASSIFICATION

( ) INTERSTATE
( ) FREEWAY/EXPWY.
( ) PRINCIPAL ARTERIAL
( ) MINOR ARTERIAL
( ) MAJOR COLLECTOR
( ) MINOR COLLECTOR
(X) LOCAL

HIGHWAY SYSTEM

( ) NATIONAL HIGHWAY SYSTEM
( ) STRATEGIC INTERMODAL SYSTEM
(X) STATE HIGHWAY SYSTEM
( ) OFF-STATE HIGHWAY SYSTEM

ACCESS CLASSIFICATION

( ) 1 - FREEWAY
( ) 2 - RESTRICTIVE w/Service Roads
( ) 3 - RESTRICTIVE w/660 ft. Connection Spacing
( ) 4 - NON-RESTRICTIVE w/2640 ft. Signal Spacing
( ) 5 - RESTRICTIVE w/440 ft. Connection Spacing
( ) 6 - NON-RESTRICTIVE w/1320 ft. Signal Spacing
( ) 7 - BOTH MEDIAN TYPES

CRITERIA

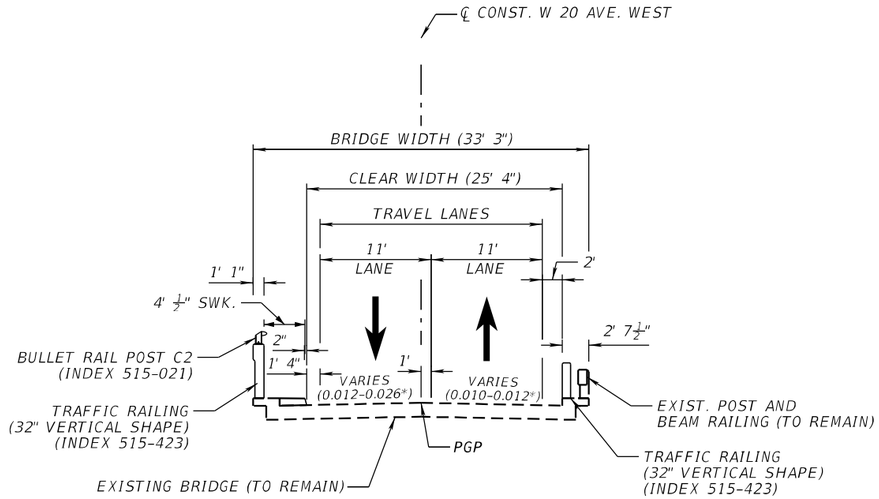
( ) NEW CONSTRUCTION / RECONSTRUCTION
( ) RESURFACING (LA FACILITIES)
(X) RRR (ARTERIALS & COLLECTORS)

POTENTIAL EXCEPTIONS AND VARIATIONS RELATED TO TYPICAL SECTION:

DESIGN VARIATION

1. LANE WIDTH
2. CROSS SLOPE
3. SHOULDER WIDTH
4. BICYCLE FACILITIES
5. BRIDGE WIDTH
6. SIDEWALK WIDTH

TYPICAL SECTION No. 36



WEST FRONTAGE ROAD/W 20TH AVENUE WEST (SECTION 87260521)
BRIDGE NO. 870569 OVER LITTLE RIVER CANAL (C-7)
STA. 411+81.83 TO STA. 412+71.84

* MATCH EXISTING CROSS SLOPE; APPROX. VALUE RANGE SHOWN.

TRAFFIC DATA

CURRENT YEAR = 2019 AADT = 9,322
ESTIMATED OPENING YEAR = 2024 AADT = 10,100
ESTIMATED DESIGN YEAR = 2044 AADT = 13,800
K = 8.30% D = 61.6% T = 2.54% (24 HOUR)
DESIGN HOUR T = 2.54%
DESIGN SPEED = 35 MPH
POSTED SPEED = 35 MPH

NOT TO SCALE

FINANCIAL PROJECT ID	SHEET NO.
441831-1-52-01	37

Appendix C

Cost Estimates

Preliminary Construction Cost Estimate Revised 11/19/2020

FM 447165-1 - SR 826 Express Lanes Modifications

0100 - Structures				**Structures Sub-total:**	**$**	**5,473,962**
0101 - Structures, Bridge 870856 (Ramp D Flyover over SR 826 & NW 103 St)				Bridge 870856 Sub-total:	$	2,667,373
0102 - Structures, Bridge 870964 (SR 826 over SR 934/NW 74th Street)				Bridge 870964 Sub-total:	$	204,092
0103 - Structures, Bridge 870257 (SR 826 over Metrorail)				Bridge 870257 Sub-total:	$	663,379
0104 - Structures, Bridge 870258 (SR 826 over FEC RR)				Bridge 870258 Sub-total:	$	573,001
0105 - Structures, Bridge 870757 (SR 826 SB over SR 932/NW 103rd Street)				Bridge 870757 Sub-total:	$	607,034
0106 - Structures, Bridge 870995 (SR 826 NB over SR 932/NW 103rd Street)				Bridge 870995 Sub-total:	$	759,082
0200 - Roadway				**Roadway Sub-total:**	**$**	**17,177,973**
0300 - Signing and Pavement Markings				**Signing Sub-total:**	**$**	**1,969,454**
0400 - Lighting				**Lighting Sub-total:**	**$**	**524,529**
0500 - Signalization				**Signal Sub-total:**	**$**	**246,746**
0550 - Intelligent Transportation System				**ITS Sub-total:**	**$**	**3,585,662**
				Sub-total	**$**	**28,978,326**
999-16	PARTNERING, DO NOT BID	1	LS	$ 30,000	$	30,000
999-20-1	DISPUTES REVIEW BOARD, MEETING- DO NOT BID	24	DA	$ 3,500	$	84,000
999-20-2	DISPUTES REVIEW BOARD, HEARING- DO NOT BID	2	EA	$ 4,000	$	8,000
999-25	INITIAL CONTINGENCY AMOUNT, DO NOT BID	1	LS		$	150,000
0-30-1	DESIGN COST FOR DESIGN BUILD PROJECTS: ESTIMATES USE ONLY (44716515201DB)	1	LS	10%	$	2,925,033
FM 447165-1				**Grand Total**	**$**	**32,175,359**

Preliminary Construction Cost Estimate Revised 11/19/2020

FM 447165-1 - SR 826 Express Lanes Modifications, Phase 2 (Ultimate)

Pay Item	Decription	Quantity	Unit	Unit Price	Total
0100 - Structures					
0101 - Structures, Bridge 870856 (Ramp D Flyover over SR 826 & NW 103 St)					
101-1	MOBILIZATION	1	LS	$ 289,940.92	$ 289,941
110-3	REMOVAL OF EXISTING STRUCTURES/BRIDGES	6,440	SF	$ 120.00	$ 772,800
400-4-4	CONCRETE CLASS IV, SUPERSTRUCTURE	43.6	CY	$ 1,300.00	$ 56,680
400-4-5	CONCRETE CLASS IV, BRIDGE SUBSTRUCTURE	516.3	CY	$ 1,000.00	$ 516,300
400-147	COMPOSITE NEOPRENE PADS	2.4	CF	$ 1,500.00	$ 3,600
415-1-4	REINFORCING STEEL - BRIDGE SUPERSTRUCTURE	13,089	LB	$ 1.65	$ 21,597
415-1-5	REINFORCING STEEL- BRIDGE SUBSTRUCTURE	132,075	LB	$ 1.10	$ 145,283
455-35-22	STEEL PILING, 24" DIA. PIPE	960	LF	$ 145.00	$ 139,200
455-133-3	SHEET PILING STEEL, F&I PERMANENT	12,000	SF	$ 16.00	$ 192,000
462-2-13	POST TENSIONING TENDONS, SUBSTRUCTURE STRAND WITH GROUT	6,525	LB	$ 5.00	$ 32,625
521-5-13	CONCRETE TRAFFIC RAILING- BRIDGE, 36" SINGLE-SLOPE	621	LF	$ 85.00	$ 52,785
		Bridge 870856 Sub-total:			**$ 2,667,373**
0102 - Structures, Bridge 870964 (SR 826 over SR 934/NW 74th Street)					
110-3	REMOVAL OF EXISTING STRUCTURES/BRIDGES	551	SF	$ 35.00	$ 19,285
400-2-4	CONC CLASS II, BRIDGE SUPERSTRUCTURE	29.7	CY	$ 750.00	$ 22,275
400-2-10	CONCRETE CLASS II, APPROACH SLABS	14.4	CY	$ 400.00	$ 5,760
400-4-5	CONCRETE CLASS IV, BRIDGE SUBSTRUCTURE	4.4	CY	$ 950.00	$ 4,180
400-9-1	BRIDGE DECK PLANING	126	SY	$ 5.00	$ 630
400-148	PLAIN NEOPRENE BEARING PADS	1.1	CF	$ 1,000.00	$ 1,100
415-1-4	REINFORCING STEEL - BRIDGE SUPERSTRUCTURE	6,079	LB	$ 1.05	$ 6,383
415-1-5	REINFORCING STEEL- BRIDGE SUBSTRUCTURE	638	LB	$ 1.00	$ 638
415-1-9	REINFORCING STEEL- APPROACH SLABS	2,889	LB	$ 1.05	$ 3,033
455-34-5	PRESTRESSED CONCRETE PILING, 24" SQ	200	LF	$ 140.00	$ 28,000
458-1-11	BRIDGE DECK EXPANSION JOINT, NEW CONSTRUCTION, F&I POURED JOINT WITH BACKER ROD	13	LF	$ 45.00	$ 585
460-2-2	STRUCT STEEL, LOW ALLOY	35,798	LB	$ 1.65	$ 59,067
521-5-13	CONCRETE TRAFFIC RAILING- BRIDGE, 36" SINGLE-SLOPE	174	LF	$ 110.00	$ 19,140
		Bridge 870964 Sub-total:			**$ 204,092**
0103 - Structures, Bridge 870257 (SR 826 over Metrorail)					
110-3	REMOVAL OF EXISTING STRUCTURES/BRIDGES	1,166	SF	$ 68.95	$ 80,398
400-1-25	CONC CLASS I, MASS SUBSTRUCTURE	15.1	CY	$ 625.00	$ 9,438
400-2-10	CONCRETE CLASS II, APPROACH SLABS	25.7	CY	$ 400.00	$ 10,280
400-4-4	CONCRETE CLASS IV, SUPERSTRUCTURE	50.3	CY	$ 1,200.00	$ 60,360
400-4-5	CONCRETE CLASS IV, BRIDGE SUBSTRUCTURE	87.5	CY	$ 950.00	$ 83,125
400-148	PLAIN NEOPRENE BEARING PADS	4.3	CF	$ 1,000.00	$ 4,300
415-1-4	REINFORCING STEEL - BRIDGE SUPERSTRUCTURE	9,800	LB	$ 1.05	$ 10,290
415-1-5	REINFORCING STEEL- BRIDGE SUBSTRUCTURE	6,442	LB	$ 1.00	$ 6,442
415-1-9	REINFORCING STEEL- APPROACH SLABS	2,574	LB	$ 1.05	$ 2,703
450-1-1	PRESTRESSED BEAMS, TYPE II	378	LF	$ 275.00	$ 103,950
455-14-3	CONCRETE SHEET PILING, 10"X30"	195	LF	$ 110.00	$ 21,450
455-34-3	PRESTRESSED CONCRETE PILING, 18" SQ	402	LF	$ 125.00	$ 50,250
455-88-4	DRILLED SHAFT, 42" DIA	120	LF	$ 550.00	$ 66,000
458-1-11	BRIDGE DECK EXPANSION JOINT, NEW CONSTRUCTION, F&I POURED JOINT WITH BACKER ROD	64	LF	$ 45.00	$ 2,880
521-5-13	CONCRETE TRAFFIC RAILING- BRIDGE, 36" SINGLE-SLOPE	126	LF	$ 110.00	$ 13,860
550-10-334	FENCING, TYPE R, 6.1-7.0', PARTIAL ENCLOSURE	126	LF	$ 215.00	$ 27,090
		Bridge 870257 Sub-total:			**$ 663,379**
0104 - Structures, Bridge 870258 (SR 826 over FEC RR)					
110-3	REMOVAL OF EXISTING STRUCTURES/BRIDGES	1,181	SF	$ 62.43	$ 73,734
400-1-25	CONC CLASS I, MASS SUBSTRUCTURE	44.4	CY	$ 625.00	$ 27,750
400-2-10	CONCRETE CLASS II, APPROACH SLABS	25.2	CY	$ 400.00	$ 10,080
400-4-4	CONCRETE CLASS IV, SUPERSTRUCTURE	50.4	CY	$ 1,200.00	$ 60,480
400-4-5	CONCRETE CLASS IV, BRIDGE SUBSTRUCTURE	54.7	CY	$ 950.00	$ 51,965
400-148	PLAIN NEOPRENE BEARING PADS	2.8	CF	$ 1,000.00	$ 2,800
415-1-4	REINFORCING STEEL - BRIDGE SUPERSTRUCTURE	9,999	LB	$ 1.05	$ 10,499
415-1-5	REINFORCING STEEL- BRIDGE SUBSTRUCTURE	4,006	LB	$ 1.00	$ 4,006
415-1-9	REINFORCING STEEL- APPROACH SLABS	2,520	LB	$ 1.05	$ 2,646
450-1-1	PRESTRESSED BEAMS, TYPE II	300	LF	$ 275.00	$ 82,500
455-34-3	PRESTRESSED CONCRETE PILING, 18" SQ	268	LF	$ 125.00	$ 33,500
455-88-4	DRILLED SHAFT, 42" DIA	120	LF	$ 550.00	$ 66,000
458-1-11	BRIDGE DECK EXPANSION JOINT, NEW CONSTRUCTION, F&I POURED JOINT WITH BACKER ROD	62	LF	$ 45.00	$ 2,790
521-5-13	CONCRETE TRAFFIC RAILING- BRIDGE, 36" SINGLE-SLOPE	150	LF	$ 110.00	$ 16,500
550-10-334	FENCING, TYPE R, 6.1-7.0', PARTIAL ENCLOSURE	150	LF	$ 215.00	$ 32,250
		Bridge 870258 Sub-total:			**$ 573,001**

Preliminary Construction Cost Estimate Revised 11/19/2020

FM 447165-1 - SR 826 Express Lanes Modifications, Phase 2 (Ultimate)

Pay Item	Decription	Quantity	Unit	Unit Price	Total
0105 - Structures, Bridge 870757 (SR 826 SB over SR 932/NW 103rd Street)					
110-3	REMOVAL OF EXISTING STRUCTURES/BRIDGES	648	SF	$ 120.00	$ 77,760
400-2-10	CONCRETE CLASS II, APPROACH SLABS	20.1	CY	$ 400.00	$ 8,040
400-4-4	CONCRETE CLASS IV, SUPERSTRUCTURE	86.4	CY	$ 1,200.00	$ 103,680
400-4-5	CONCRETE CLASS IV, BRIDGE SUBSTRUCTURE	32.6	CY	$ 950.00	$ 30,970
400-148	PLAIN NEOPRENE BEARING PADS	1.9	CF	$ 1,000.00	$ 1,900
415-1-4	REINFORCING STEEL - BRIDGE SUPERSTRUCTURE	16,179	LB	$ 1.05	$ 16,988
415-1-5	REINFORCING STEEL- BRIDGE SUBSTRUCTURE	3,802	LB	$ 1.00	$ 3,802
415-1-9	REINFORCING STEEL- APPROACH SLABS	2,012	LB	$ 1.05	$ 2,113
450-2-72	PREST BEAMS: FLORIDA-I BEAM 72"	464	LF	$ 320.00	$ 148,480
455-34-5	PRESTRESSED CONCRETE PILING, 24" SQ	268	LF	$ 140.00	$ 37,520
455-88-6	DRILLED SHAFT, 60" DIA	60	LF	$ 600.00	$ 36,000
458-1-11	BRIDGE DECK EXPANSION JOINT, NEW CONSTRUCTION, F&I POURED JOINT WITH BACKER ROD	37	LF	$ 45.00	$ 1,665
521-5-13	CONCRETE TRAFFIC RAILING- BRIDGE, 36" SINGLE-SLOPE	232	LF	$ 110.00	$ 25,520
548-12	RETAINING WALL SYSTEM, PERMANENT, EXCLUDING BARRIER	357	SF	$ 32.00	$ 11,424
		Bridge 870757 Sub-total:			**$ 607,034**
0106 - Structures, Bridge 870995 (SR 826 NB over SR 932/NW 103rd Street)					
110-3	REMOVAL OF EXISTING STRUCTURES/BRIDGES	1,161	SF	$ 120.00	$ 139,320
400-2-10	CONCRETE CLASS II, APPROACH SLABS	25.9	CY	$ 400.00	$ 10,360
400-4-4	CONCRETE CLASS IV, SUPERSTRUCTURE	110.2	CY	$ 1,200.00	$ 132,240
400-4-5	CONCRETE CLASS IV, BRIDGE SUBSTRUCTURE	59.3	CY	$ 950.00	$ 56,335
400-148	PLAIN NEOPRENE BEARING PADS	1.9	CF	$ 1,000.00	$ 1,900
415-1-4	REINFORCING STEEL - BRIDGE SUPERSTRUCTURE	20,814	LB	$ 1.05	$ 21,855
415-1-5	REINFORCING STEEL- BRIDGE SUBSTRUCTURE	7,134	LB	$ 1.00	$ 7,134
415-1-9	REINFORCING STEEL- APPROACH SLABS	2,593	LB	$ 1.05	$ 2,723
450-2-72	PREST BEAMS: FLORIDA-I BEAM 72"	464	LF	$ 320.00	$ 148,480
455-34-5	PRESTRESSED CONCRETE PILING, 24" SQ	476	LF	$ 140.00	$ 66,640
458-1-11	BRIDGE DECK EXPANSION JOINT, NEW CONSTRUCTION, F&I POURED JOINT WITH BACKER ROD	49	LF	$ 45.00	$ 2,205
521-5-13	CONCRETE TRAFFIC RAILING- BRIDGE, 36" SINGLE-SLOPE	232	LF	$ 110.00	$ 25,520
548-12	RETAINING WALL SYSTEM, PERMANENT, EXCLUDING BARRIER	558	SF	$ 32.00	$ 17,856
		Bridge 870995 Sub-total:			**$ 759,082**
		Structures Sub-total:			**$ 5,473,962**

Preliminary Construction Cost Estimate Revised 11/19/2020

FM 447165-1 - SR 826 Express Lanes Modifications, Phase 2 (Ultimate)

Pay Item	Decription	Quantity	Unit	Unit Price	Total
0200 - Roadway					
101-1	MOBILIZATION	1	LS	8%	$ 1,456,000
102-1	MAINTENANCE OF TRAFFIC	650	DA	20%	$ 3,639,000
102-14	TRAFFIC CONTROL OFFICER	288	HR	$ 27.09	$ 7,802
102-60	WORK ZONE SIGN	21,585	ED	$ 0.32	$ 6,907
102-71-15	TEMPORARY BARRIER, F&I, ANCHORED	1,500	LF	$ 5.15	$ 7,725
102-71-16	TEMPORARY BARRIER, F&I, FREE STANDING	1,400	LF	$ 10.82	$ 15,148
102-74-1	CHANNELIZING DEVICE- TYPES I, II, DI, VP, DRUM, OR LCD	243,222	ED	$ 0.21	$ 51,077
102-76	ARROW BOARD / ADVANCE WARNING ARROW PANEL	2,608	ED	$ 6.20	$ 16,170
102-89-1	TEMPORARY CRASH CUSHION, REDIRECTIVE OPTION	5	LO	$ 932.61	$ 4,663
102-99	PORTABLE CHANGEABLE MESSAGE SIGN, TEMPORARY	1,856	ED	$ 11.76	$ 21,827
102-115	TYPE III BARRICADE	5,184	ED	$ 0.32	$ 1,659
102-150-1	PORTABLE REGULATORY, SIGN	1,730	ED	$ 6.30	$ 10,899
102-150-2	RADAR SPEED DISPLAY UNIT	1,730	ED	$ 6.30	$ 10,899
110-1-1	CLEARING & GRUBBING	5.140	AC	$ 20,000.00	$ 102,800
120-1	REGULAR EXCAVATION	22,357	CY	$ 13.97	$ 312,331
120-6	EMBANKMENT	45,185	CY	$ 16.49	$ 745,105
160-4	TYPE B STABILIZATION	18,526	SY	$ 5.04	$ 93,373
285-704	OPTIONAL BASE, BASE GROUP 04	7,356	SY	$ 16.80	$ 123,576
285-706	OPTIONAL BASE, BASE GROUP 06	3,624	SY	$ 51.45	$ 186,453
285-711	OPTIONAL BASE, BASE GROUP 11	3,693	SY	$ 15.86	$ 58,573
285-712	OPTIONAL BASE, BASE GROUP 12	5,510	SY	$ 32.03	$ 176,485
327-70-6	MILLING EXIST ASPH PAVT, 1 1/2" AVG DEPTH	11,360	SY	$ 2.94	$ 33,398
327-70-11	MILLING EXIST ASPH PAVT, 2 1/4" AVG DEPTH	129,722	SY	$ 2.52	$ 326,900
334-1-14	SUPERPAVE ASPHALTIC CONC, TRAFFIC D	1,702.9	TN	$ 109.20	$ 185,957
334-1-54	SUPERPAVE ASPHALTIC CONCRETE, TRAFFIC D, PG76-22	12,641.2	TN	$ 125.16	$ 1,582,173
337-7-25	ASPHALT CONCRETE FRICTION COURSE, INC BIT, FC-5, PG 76-22	5,557.0	TN	$ 148.58	$ 825,663
339-1	MISCELLANEOUS ASPHALT PAVEMENT	154.8	TN	$ 159.92	$ 24,756
425-1-541	INLETS, DT BOT, TYPE D, <10'	4	EA	$ 4,410.00	$ 17,640
425-1-701	INLETS, GUTTER, TYPE S, <10'	2	EA	$ 4,683.32	$ 9,367
425-1-883	INLETS, BARRIER WALL, RIGID, CURB & GUTTER, J BOT<10'	1	EA	$ 7,888.65	$ 7,889
425-1-921	INLETS, ADJACENT BARRIER, <=10'	13	EA	$ 7,410.90	$ 96,342
425-1-923	INLETS, ADJACENT BARRIER, J BOTTOM, < 10'	27	EA	$ 8,893.08	$ 240,113
425-2-41	MANHOLES, P-7, <10'	23	EA	$ 5,055.23	$ 116,270
425-2-72	MANHOLES, J-7, >10'	2	EA	$ 8,168.16	$ 16,336
430-174-118	PIPE CULVERT, OPTIONAL MATERIAL, ROUND, 18"SD	2,146	LF	$ 74.97	$ 160,886
430-174-124	PIPE CULVERT, OPTIONAL MATERIAL, ROUND, 24"SD	158	LF	$ 88.20	$ 13,936
430-174-130	PIPE CULVERT, OPTIONAL MATERIAL, ROUND, 30"SD	445	LF	$ 148.79	$ 66,212
430-611-125	U-ENDWALL WITH BAFFLES, INDEX 261/430-011, 1:4 SLOPE, 18"PIPE	7	EA	$ 3,887.10	$ 27,210
436-1-1	TRENCH DRAIN, STANDARD	479	LF	$ 273.42	$ 130,968
443-70-4	FRENCH DRAIN, 24"	1,285	LF	$ 158.24	$ 203,338
443-70-5	FRENCH DRAIN, 30"	454	LF	$ 173.99	$ 78,991
520-6	SHOULDER GUTTER- CONCRETE	366	LF	$ 21.00	$ 7,686
521-1-11	MEDIAN CONCRETE BARRIER, 38" HEIGHT	291	LF	$ 166.74	$ 48,521
521-1-12	MEDIAN CONCRETE BARRIER, SHORT GRADE-SEPARATED	1,534	LF	$ 141.12	$ 216,478
521-5-13	CONCRETE TRAFFIC RAILING- BRIDGE, 36" SINGLE-SLOPE	1,126	LF	$ 132.20	$ 148,791
521-8-7	CONCRETE BARRIER, WITH JUNCTION SLAB, 36" SINGLE SLOPE	5,118	LF	$ 265.65	$ 1,359,570
536-1-1	GUARDRAIL -ROADWAY, GENERAL TL-3	516	LF	$ 17.43	$ 8,994
536-8-112	GUARDRAIL TRANSITION CONNECTION TO RIGID BARRIER, FURNISH AND INSTALL, NEW BRIDGE OR CONCRETE BARRIER, APPROACH TL-3	1	EA	$ 2,940.00	$ 2,940
536-8-113	GUARDRAIL TRANSITION CONNECTION TO RIGID BARRIER, FURNISH AND INSTALL, NEW BRIDGE OR CONCRETE BARRIER, TRAILING	2	EA	$ 2,525.25	$ 5,051
536-73	GUARDRAIL REMOVAL	516	LF	$ 2.31	$ 1,192
544-3-2	CRASH CUSHION, TL-3, WIDE	4	EA	$ 34,884.58	$ 139,538
548-12	RETAINING WALL SYSTEM, PERMANENT, EXCLUDING BARRIER	123,820	SF	$ 32.00	$ 3,962,240
630-2-12	CONDUIT, FURNISH & INSTALL, DIRECTIONAL BORE	180	LF	$ 19.85	$ 3,573
695-1-1	TRAFFIC MONITORING SITE VEHICLE SENSOR-NON-WEIGHT, FURNISH & INSTALL	18	EA	$ 1,659.00	$ 29,862
695-6-12	TRAFFIC MONITORING SITE INDUCTIVE LOOP ASSEMBLY, FURNISH & INSTALL, 2 LOOPS	18	EA	$ 1,706.78	$ 30,722
				Roadway Sub-total:	**$ 17,177,973**

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Pay Item	Decription	Quantity	Unit	Unit Price	Total
0300 - Signing and Pavement Markings					
700-1-11	SINGLE POST SIGN, F&I GROUND MOUNT, UP TO 12 SF	1	AS	$ 308.81	$ 309
700-1-12	SINGLE POST SIGN, F&I GROUND MOUNT, 12-20 SF	2	AS	$ 955.82	$ 1,912
700-1-13	SINGLE POST SIGN, F&I GROUND MOUNT, 21-30 SF	2	AS	$ 1,230.81	$ 2,462
700-1-31	SINGLE POST SIGN, F&I BRIDGE MOUNT INDEX 11870/700-012, UP TO 12 SF	1	AS	$ 1,569.75	$ 1,570
700-1-60	SINGLE POST SIGN, REMOVE	7	AS	$ 24.78	$ 173
700-3-206	SIGN PANEL, FURNISH & INSTALL OVERHEAD MOUNT, 101-200 SF	2	EA	$ 5,260.50	$ 10,521
700-3-207	SIGN PANEL, FURNISH & INSTALL OVERHEAD MOUNT, 201-300 SF	2	EA	$ 5,197.50	$ 10,395
700-3-208	SIGN PANEL, FURNISH & INSTALL OVERHEAD MOUNT, 301-400 SF	5	EA	$ 7,035.00	$ 35,175
700-3-209	SIGN PANEL, FURNISH & INSTALL OVERHEAD MOUNT, 401-500 SF	1	EA	$ 17,520.28	$ 17,520
700-3-211	SIGN PANEL, FURNISH & INSTALL OVERHEAD MOUNT, 601 SF AND GREATER	3	EA	$ 18,375.00	$ 55,125
700-3-505	SIGN PANEL, RELOCATE, 51-100 SF	2	EA	$ 693.97	$ 1,388
700-3-506	SIGN PANEL, RELOCATE, 101-200 SF	2	EA	$ 1,601.78	$ 3,204
700-3-507	SIGN PANEL, RELOCATE, 201-300 SF	6	EA	$ 1,522.50	$ 9,135
700-3-508	SIGN PANEL, RELOCATE, 301-400 SF	2	EA	$ 2,257.50	$ 4,515
700-3-605	SIGN PANEL, REMOVE, 51-100 SF	1	EA	$ 262.19	$ 262
700-3-606	SIGN PANEL, REMOVE, 101-200 SF	3	EA	$ 609.00	$ 1,827
700-3-607	SIGN PANEL, REMOVE, 201-300 SF	1	EA	$ 521.54	$ 522
700-3-608	SIGN PANEL, REMOVE, 301-400 SF	7	EA	$ 649.69	$ 4,548
700-3-611	SIGN PANEL, REMOVE, 601 SF AND GREATER	2	EA	$ 2,509.50	$ 5,019
700-4-112	OVERHEAD STATIC SIGN STRUCTURE, FURNISH & INSTALL, CANTILEVER, 21-30 FT	1	EA	$ 62,055.00	$ 62,055
700-4-113	OVERHEAD STATIC SIGN STRUCTURE, FURNISH & INSTALL, CANTILEVER, 31-40 FT	1	EA	$ 91,875.00	$ 91,875
700-4-114	OVERHEAD STATIC SIGN STRUCTURE, FURNISH & INSTALL, CANTILEVER, 41-50 FT	2	EA	$ 99,876.00	$ 199,752
700-4-126	OVERHEAD STATIC SIGN STRUCTURE, FURNISH & INSTALL, SPAN, 101-150 FT	6	EA	$ 146,618.85	$ 879,713
700-4-610	OVERHEAD STATIC SIGN STRUCTURE, REMOVE CANTILEVER	7	EA	$ 6,063.23	$ 42,443
700-4-620	OVERHEAD STATIC SIGN STRUCTURE, REMOVE SPAN	7	EA	$ 9,975.00	$ 69,825
701-18-101	PROFILED THERMOPLASTIC,STANDARD- ASPHALT SURFACES, WHITE, SOLID,6"	0.293	GM	$ 6,300.00	$ 1,846
701-18-201	PROFILED THERMOPLASTIC,STANDARD- ASPHALT SURFACES, YELLOW, SOLID,6"	1.347	GM	$ 6,300.00	$ 8,486
704-1-2	TUBULAR MARKER, DURABLE, 36" YELLOW POST	4,500	EA	$ 52.50	$ 236,250
710-90	PAINTED PAVEMENT MARKINGS, FINAL SURFACE	1	LS	$ 41,853.80	$ 41,854
711-11-103	THERMOPLASTIC, STANDARD, WHITE, SOLID, 12" FOR INTERCHANGE MARKINGS	1.364	GM	$ 8,820.00	$ 12,030
711-11-124	THERMOPLASTIC, STANDARD, WHITE, SOLID, 18" FOR DIAGONALS AND CHEVRONS	674	LF	$ 2.42	$ 1,631
711-11-125	THERMOPLASTIC, STANDARD, WHITE, SOLID, 24" FOR STOP LINE AND CROSSWALK	73	LF	$ 3.57	$ 261
711-11-160	THERMOPLASTIC, STANDARD, WHITE, MESSAGE OR SYMBOL	12	EA	$ 101.64	$ 1,220
711-11-170	THERMOPLASTIC, STANDARD, WHITE, ARROW	39	EA	$ 58.38	$ 2,277
711-11-224	THERMOPLASTIC, STANDARD, YELLOW, SOLID, 18" FOR DIAGONAL OR CHEVRON	1,252	LF	$ 2.63	$ 3,293
711-14-125	THERMOPLASTIC, PREFORMED, WHITE, SOLID, 24" FOR CROSSWALK	182	LF	$ 16.38	$ 2,981
711-14-560	THERMOPLASTIC, PREFORMED, WHITE WITH BLACK CONTRAST ON CONCRETE PAVEMENT, MESSAGE OR SYMBOL	2	EA	$ 672.95	$ 1,346
711-14-570	THERMOPLASTIC, PREFORMED, WHITE WITH BLACK CONTRAST, ARROW ON CONCRETE SURFACE	2	EA	$ 829.50	$ 1,659
711-15-101	THERMOPLASTIC, STANDARD-OPEN GRADED ASPHALT SURFACES WHITE, SOLID, 6"	1.923	GM	$ 4,305.00	$ 8,279
711-15-102	THERMOPLASTIC, STANDARD-OPEN GRADED ASPHALT SURFACES, WHITE, SOLID, 8"	8.061	GM	$ 5,355.00	$ 43,167
711-15-131	THERMOPLASTIC, STANDARD-OPEN GRADED ASPHALT SURFACES, WHITE, SKIP, 6",10-30 SKIP OR 3-9 LANE DROP	11.349	GM	$ 1,732.50	$ 19,662
711-15-133	THERMOPLASTIC, STANDARD-OPEN GRADED ASPHALT SURFACES, WHITE, SKIP, 12"- APPROACH TO TOLL PLAZA OR 3-9 LANE DROP	1.783	GM	$ 3,043.74	$ 5,427
711-15-201	THERMOPLASTIC, STANDARD-OPEN GRADED ASPHALT SURFACES, YELLOW, SOLID, 6"	1.036	GM	$ 4,305.00	$ 4,460
711-16-101	THERMOPLASTIC, STANDARD-OTHER SURFACES, WHITE, SOLID, 6"	1.178	GM	$ 4,168.92	$ 4,911
711-16-102	THERMOPLASTIC, STANDARD-OTHER SURFACES, WHITE, SOLID, 8"	0.070	GM	$ 4,969.55	$ 348
711-16-131	THERMOPLASTIC, STANDARD-OTHER SURFACES, WHITE, SKIP, 6",10-30 SKIP OR 3-9 LANE DROP	0.523	GM	$ 1,234.28	$ 646
711-16-201	THERMOPLASTIC, STANDARD-OTHER SURFACES, YELLOW, SOLID, 6"	0.566	GM	$ 4,178.79	$ 2,365
713-103-101	PERMANENT TAPE, WHITE, SOLID, 6" FOR CONCRETE BRIDGES	0.459	GM	$ 23,633.09	$ 10,848
713-103-102	PERMANENT TAPE, WHITE, SOLID, 8" EXIT LANE AT INTERCHANGE ON CONCRETE PAVEMENT	0.498	GM	$ 33,366.48	$ 16,617
713-103-103	PERMANENT TAPE, WHITE, SOLID LANE DROP MARKING, 12" FOR CONCRETE BRIDGES	0.039	GM	$ 54,030.06	$ 2,107
713-103-131	PERMANENT TAPE, WHITE, SKIP/DOTTED, 6" FOR CONCRETE SURFACES	0.889	GM	$ 7,225.37	$ 6,423

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Pay Item	Decription	Quantity	Unit	Unit Price	Total
713-103-133	PERMANENT TAPE, WHITE, SKIP, 12" WIDE 3'-9' DROP LANE ON CONCRETE SURFACES	0.076	GM	$ 14,871.05	$ 1,130
713-103-201	PERMANENT TAPE, YELLOW, SOLID, 6" FOR CONCRETE BRIDGES	0.400	GM	$ 24,038.60	$ 9,615
713-103-331	PERMANENT TAPE, BLACK, SKIP/DOTTED, 6" FOR CONCRETE SURFACES	0.890	GM	$ 6,237.00	$ 5,551
713-103-333	PERMANENT TAPE, BLACK, 3'-9' DROP LANE, 12" ON CONCRETE SURFACES	0.076	GM	$ 20,034.00	$ 1,523
	Sub-total Signing and Pavement Markings				**$ 1,969,454**
Lump Sum Pay Item 710-90, Painted Pavement Markings, Final Surface					***$ 41,854***
706-1-1	*RAISED PAVEMENT MARKER, TYPE B WITHOUT FINAL SURFACE MARKINGS*	*3,108*	*EA*	*$ 4.31*	*$ 13,395*
710-11-101	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID, 6"*	*3.326*	*GM*	*$ 775.95*	*$ 2,581*
710-11-102	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR INTERCHANGE AND URBAN ISLAND, 8"*	*8.131*	*GM*	*$ 1,029.11*	*$ 8,368*
710-11-103	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR INTERCHANGE MARKINGS, 12"*	*1.364*	*GM*	*$ 1,470.00*	*$ 2,005*
710-11-124	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR DIAGONAL OR CHEVRON, 18"*	*674*	*LF*	*$ 0.84*	*$ 566*
710-11-125	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR STOP LINE OR CROSSWALK, 24"*	*73*	*LF*	*$ 1.05*	*$ 77*
710-11-131	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SKIP, 10-30 OR 3-9 SKIP, 6" WIDE*	*21.715*	*GM*	*$ 351.86*	*$ 7,641*
710-11-133	*PAINTED PAVEMENT MARKING, STANDARD,WHITE, 3'-9' SKIP DROP LINE AND APPROACH TO TOLL PLAZA, 12" WIDE,*	*1.783*	*GM*	*$ 1,151.96*	*$ 2,054*
710-11-160	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, MESSAGE OR SYMBOL*	*12*	*EA*	*$ 50.61*	*$ 607*
710-11-170	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, ARROWS*	*39*	*EA*	*$ 26.25*	*$ 1,024*
710-11-201	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SOLID, 6"*	*2.910*	*GM*	*$ 763.46*	*$ 2,222*
710-11-224	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SOLID FOR DIAGONAL OR CHEVRON, 18"*	*1,252*	*LF*	*$ 1.05*	*$ 1,315*

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Pay Item	Decription	Quantity	Unit	Unit Price	Total
0400 - Lighting					
630-2-12	CONDUIT, FURNISH & INSTALL, DIRECTIONAL BORE	500	LF	$ 19.85	$ 9,925
630-2-15	CONDUIT, FURNISH & INSTALL, BRIDGE MOUNT	800	LF	$ 30.45	$ 24,360
630-2-16	CONDUIT, FURNISH & INSTALL, EMBEDDED CONCRETE BARRIERS AND TRAFFIC RAILINGS	18,408	LF	$ 10.08	$ 185,553
635-2-11	PULL & SPLICE BOX, F&I, 13" x 24" COVER SIZE	16	EA	$ 711.59	$ 11,385
635-3-12	JUNCTION BOX, FURNISH & INSTALL, MOUNTED	10	EA	$ 472.50	$ 4,725
635-3-13	JUNCTION BOX, FURNISH & INSTALL, EMBEDDED	45	EA	$ 392.07	$ 17,643
715-1-13	LIGHTING CONDUCTORS, F&I, INSULATED, NO 4 TO NO 2	21,492	LF	$ 2.42	$ 52,011
715-4-12	LIGHT POLE COMPLETE, FURNISH & INSTALL STANDARD POLE STANDARD FOUNDATION, 35' MOUNTING HEIGHT	15	EA	$ 5,202.96	$ 78,044
715-4-14	LIGHT POLE COMPLETE, FURNISH & INSTALL STANDARD POLE STANDARD FOUNDATION, 45' MOUNTING HEIGHT	1	EA	$ 7,218.23	$ 7,218
715-4-71	LIGHT POLE COMPLETE, REMOVE POLE, FOUNDATION REMAINS	9	EA	$ 735.00	$ 6,615
715-7-21	LOAD CENTER, REWORK, SECONDARY VOLTAGE	1	EA	$ 1,693.86	$ 1,694
715-11-125	LUMINAIRE, F&I, UNDER DECK, WALL MOUNT	9	EA	$ 942.59	$ 8,483
715-11-211	LUMINAIRE, F&I- REPLACE EXISTING LUMINAIRE ON EXISTING POLE/ARM, ROADWAY, COBRA HEAD	62	EA	$ 1,422.96	$ 88,224
715-500-3	POLE CABLE DISTRIBUTION SYSTEM, WALL MOUNT	78	EA	$ 367.29	$ 28,649
				Lighting Sub-total:	**$ 524,529**

0500 - Signalization					
630-2-12	CONDUIT, FURNISH & INSTALL, DIRECTIONAL BORE	387	LF	$ 19.85	$ 7,682
630-2-65	CONDUIT, REMOVE, BRIDGE MOUNT	100	LF	$ 5.78	$ 578
632-7-1	SIGNAL CABLE- NEW OR RECONSTRUCTED INTERSECTION, FURNISH & INSTALL	2	PI	$ 5,245.07	$ 10,490
635-2-11	PULL & SPLICE BOX, F&I, 13" x 24" COVER SIZE	18	EA	$ 711.59	$ 12,809
635-2-12	PULL & SPLICE BOX, F&I, 24" X 36" COVER SIZE	1	EA	$ 1,421.91	$ 1,422
639-1-122	ELECTRICAL POWER SERVICE, F&I, UNDERGROUND, METER PURCHASED BY CONTRACTOR	1	AS	$ 3,485.27	$ 3,485
639-2-1	ELECTRICAL SERVICE WIRE, FURNISH & INSTALL	100	LF	$ 4.83	$ 483
641-2-12	PRESTRESSED CONCRETE POLE, F&I, TYPE P-II SERVICE POLE	1	EA	$ 1,657.64	$ 1,658
646-1-11	ALUMINUM SIGNALS POLE, PEDESTAL	2	EA	$ 1,219.79	$ 2,440
646-1-40	ALUMINUM SIGNALS POLE, RELOCATE	1	EA	$ 1,201.73	$ 1,202
649-21-11	STEEL MAST ARM ASSEMBLY, FURNISH AND INSTALL, DOUBLE ARM 60'-30'	1	EA	$ 55,650.00	$ 55,650
649-21-13	STEEL MAST ARM ASSEMBLY, FURNISH AND INSTALL, DOUBLE ARM 60'-50'	1	EA	$ 68,176.19	$ 68,176
649-26-3	STEEL MAST ARM ASSEMBLY, REMOVE, SHALLOW FOUNDATION-BOLT ON ATTACHMENT	2	EA	$ 2,696.51	$ 5,393
650-1-14	VEHICULAR TRAFFIC SIGNAL, FURNISH & INSTALL ALUMINUM, 3 SECTION, 1 WAY	12	AS	$ 1,022.81	$ 12,274
650-1-16	VEHICULAR TRAFFIC SIGNAL, FURNISH & INSTALL ALUMINUM, 4 SECTION, 1 WAY	2	AS	$ 1,350.83	$ 2,702
653-1-11	PEDESTRIAN SIGNAL, FURNISH & INSTALL LED COUNTDOWN, 1 WAY	2	AS	$ 849.87	$ 1,700
660-2-101	LOOP ASSEMBLY- F&I, TYPE A	6	AS	$ 1,124.97	$ 6,750
665-1-11	PEDESTRIAN DETECTOR, FURNISH & INSTALL, STANDARD	2	EA	$ 301.77	$ 604
670-5-140	TRAFFIC CONTROLLER ASSEMBLY, FURNISH & INSTALL MODEL 2070	1	AS	$ 27,877.61	$ 27,878
670-5-400	TRAFFIC CONTROLLER ASSEMBLY, MODIFY	2	AS	$ 2,456.69	$ 4,913
700-3-201	SIGN PANEL, FURNISH & INSTALL OVERHEAD MOUNT, UP TO 12 SF	2	EA	$ 585.48	$ 1,171
700-4-640	OVERHEAD STATIC SIGN STRUCTURE, REMOVE BRIDGE MOUNT	2	EA	$ 2,814.00	$ 5,628
700-5-21	INTERNALLY ILLUMINATED SIGN, FURNISH & INSTALL OVERHEAD MOUNT, UP TO 12 SF	4	EA	$ 2,914.91	$ 11,660
				Signal Sub-total:	**$ 246,746**

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Pay Item	Decription	Quantity	Unit	Unit Price	Total
0550 - Intelligent Transportation System					
630-2-11	CONDUIT, FURNISH & INSTALL, OPEN TRENCH	2,680	LF	$ 9.07	$ 24,308
630-2-12	CONDUIT, FURNISH & INSTALL, DIRECTIONAL BORE	4,285	LF	$ 18.84	$ 80,729
630-2-15	CONDUIT, FURNISH & INSTALL, BRIDGE MOUNT	2,910	LF	$ 28.94	$ 84,215
633-1-121	FIBER OPTIC CABLE, F&I, UNDERGROUND,2-12 FIBERS	12,315	LF	$ 2.55	$ 31,403
633-1-122	FIBER OPTIC CABLE, F&I, UNDERGROUND,13-48 FIBERS	525	LF	$ 2.46	$ 1,292
633-1-123	FIBER OPTIC CABLE, F&I, UNDERGROUND,49-96 FIBERS	11,355	LF	$ 3.39	$ 38,493
633-2-31	FIBER OPTIC CONNECTION, INSTALL, SPLICE	288	EA	$ 39.50	$ 11,376
633-3-11	FIBER OPTIC CONNECTION HARDWARE, F&I, SPLICE ENCLOSURE	2	EA	$ 887.72	$ 1,775
633-4-1	SIGNALS COMMUNICATION CABLE- TWISTED PAIR CABLE, FURNISH & INSTALL	1,050	LF	$ 5.22	$ 5,481
635-2-11	PULL & SPLICE BOX, F&I, 13" x 24" COVER SIZE	32	EA	$ 677.62	$ 21,684
635-2-12	PULL & SPLICE BOX, F&I, 24" X 36" COVER SIZE	25	EA	$ 1,354.19	$ 33,855
635-3-13	JUNCTION BOX, FURNISH & INSTALL, EMBEDDED	20	EA	$ 373.40	$ 7,468
639-2-1	ELECTRICAL SERVICE WIRE, FURNISH & INSTALL	10,295	LF	$ 4.51	$ 46,430
641-2-13	PRESTRESSED CONCRETE POLE, F&I, TYPE P-III	2	EA	$ 12,290.41	$ 24,581
641-3-175	CONCRETE CCTV POLE, FURNISH & INSTALL WITH LOWERING DEVICE, 75'	5	EA	$ 24,103.79	$ 120,519
650-1-13	VEHICULAR TRAFFIC SIGNAL, FURNISH & INSTALL ALUMINUM, 2 SECTION, 1-2 WAYS	2	AS	$ 790.00	$ 1,580
650-1-60	VEHICULAR TRAFFIC SIGNAL, REMOVE- POLES TO REMAIN	2	AS	$ 91.36	$ 183
660-3-12	VEHICLE DETECTION SYSTEM- MICROWAVE, FURNISH & INSTALL, ABOVE GROUND EQUIPMENT	8	EA	$ 8,241.82	$ 65,935
660-3-52	VEHICLE DETECTION SYSTEM - MICROWAVE, ADJUST & MODIFY, ABOVE GROUND EQUIPMENT	37	EA	$ 769.32	$ 28,465
660-3-60	VEHICLE DETECTION SYSTEM - MICROWAVE, REMOVE, COMPLETE SYSTEM	8	EA	$ 332.73	$ 2,662
670-5-300	TRAFFIC CONTROLLER ASSEMBLY, INSTALL	2	AS	$ 3,800.00	$ 7,600
676-2-122	ITS CABINET, FURNISH & INSTALL, POLE MOUNT WITH SUNSHIELD, 336S, 24" W X 46" H X 22" D	1	EA	$ 5,632.75	$ 5,633
676-2-143	ITS CABINET, FURNISH & INSTALL, BASE MOUNT, 334, 24" W X 66" H X 30" D	13	EA	$ 6,404.72	$ 83,261
682-1-133	ITS CCTV CAMERA, F&I, DOME ENCLOSURE - NON-PRESSURIZED, IP, HIGH DEFINITION	13	EA	$ 5,006.45	$ 65,084
682-1-600	ITS CCTV CAMERA,, REMOVE & DISPOSAL	6	EA	$ 305.00	$ 1,830
684-6-11	WIRELESS COMMUNICATION DEVICE, FURNISH & INSTALL ETHERNET ACCESS POINT	2	EA	$ 3,415.00	$ 6,830
684-6-60	WIRELESS COMMUNICATION DEVICE, REMOVE	2	EA	$ 257.00	$ 514
700-7-132	EMBEDDED DYNAMIC MESSAGE SIGN, FURNISH & INSTALL- WITH UPS, FULL COLOR, 12-20 SF	10	EA	$ 21,980.00	$ 219,800
700-7-600	EMBEDDED DYNAMIC MESSAGE SIGN, REMOVE	8	EA	$ 1,247.40	$ 9,979
700-8-135	FRONT ACCESS DYNAMIC MESSAGE SIGN, FURNISH & INSTALL- WITH UPS, FULL COLOR, 51-100 SF	6	EA	$ 80,000.00	$ 480,000
700-8-600	FRONT ACCESS DYNAMIC MESSAGE SIGN, REMOVE	6	EA	$ 3,746.71	$ 22,480
700-9-137	WALK-IN DYNAMIC MESSAGE SIGN, FURNISH & INSTALL- WITH UPS FULL COLOR, 201-300 SF	1	EA	$ 118,619.66	$ 118,620
700-9-600	WALK-IN DYNAMIC MESSAGE SIGN, REMOVE	1	EA	$ 3,782.22	$ 3,782
700-10-116	DMS SUPPORT STRUCTURE, FURNISH & INSTALL, SPAN, 101-150 FT	1	EA	$ 222,000.00	$ 222,000
700-10-600	DMS SUPPORT STRUCTURE, REMOVE	1	EA	$ 5,813.92	$ 5,814
	TOLL GANTRY	1	LS	$ 1,700,000	$ 1,700,000
				ITS Sub-total:	**$ 3,585,662**
				SUBTOTAL	**$ 28,978,326**
999-16	PARTNERING, DO NOT BID	1	LS	$ 30,000	$ 30,000
999-20-1	DISPUTES REVIEW BOARD, MEETING- DO NOT BID	24	DA	$ 3,500	$ 84,000
999-20-2	DISPUTES REVIEW BOARD, HEARING- DO NOT BID	2	EA	$ 4,000	$ 8,000
999-25	INITIAL CONTINGENCY AMOUNT, DO NOT BID	1	LS		$ 150,000
0-30-1	DESIGN COST FOR DESIGN BUILD PROJECTS: ESTIMATES USE ONLY (44716515201DB)	1	LS	10%	$ 2,925,033
FM 447165-1				**Grand Total**	**$ 32,175,359**

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FM 441831-1, SR 826 Frontage Roads From NW 103rd Street to NW 122nd Street					
Pay Item	**Decription**	**Quantity**	**Unit**	**Unit Price**	**Total**
Roadway					
0-30-1	DESIGN COST FOR DESIGN BUILD PROJECTS: ESTIMATES USE ONLY (44183115201DB)	1	LS	10%	$ 361,825
101-1	MOBILIZATION	1	LS	8%	$ 241,915
102-1	MAINTENANCE OF TRAFFIC	150	DA	10%	$ 302,394
102-14	TRAFFIC CONTROL OFFICER	88	HR	$ 27.10	$ 2,385
102-60	WORK ZONE SIGN	12,000	ED	$ 0.30	$ 3,600
102-71-16	TEMPORARY BARRIER, F&I, FREE STANDING	1,400	LF	$ 10.80	$ 15,120
102-71-26	TEMPORARY BARRIER, RELOCATE, FREE STANDING	2,800	LF	$ 4.30	$ 12,040
102-74-1	CHANNELIZING DEVICE- TYPES I, II, DI, VP, DRUM, OR LCD	38,000	ED	$ 0.20	$ 7,600
102-74-8	CHANNELIZING DEVICE- PEDESTRIAN LCD (LONGITUDINAL CHANNELIZING DEVICE)	60,000	FD	$ 0.20	$ 12,000
102-76	ARROW BOARD / ADVANCE WARNING ARROW PANEL	240	ED	$ 6.20	$ 1,488
102-89-1	TEMPORARY CRASH CUSHION, REDIRECTIVE OPTION	24	LO	$ 932.60	$ 22,382
102-99	PORTABLE CHANGEABLE MESSAGE SIGN, TEMPORARY	1,956	ED	$ 11.70	$ 22,885
102-104	TEMPORARY SIGNALIZATION AND MAINTENANCE, INTERSECTION	600	ED	$ 5.30	$ 3,180
102-107-1	TEMPORARY TRAFFIC DETECTION AND MAINTENANCE, INTERSECTION	600	ED	$ 5.30	$ 3,180
102-115	TYPE III BARRICADE	1,400	ED	$ 0.40	$ 560
104-18	INLET PROTECTION SYSTEM	110	EA	$ 137.20	$ 15,092
107-1	LITTER REMOVAL	1.94	AC	$ 11.70	$ 23
107-2	MOWING	0.72	AC	$ 19.80	$ 14
110-1-1	CLEARING & GRUBBING	4.62	AC	$ 20,000.00	$ 92,400
110-2-2	SELECTIVE CLEARING AND GRUBBING, AREAS WITH TREES TO REMAIN	0.57	AC	$ 37,129.60	$ 21,164
110-21	TREE PROTECTION BARRIER	2,100	LF	$ 1.90	$ 3,990
110-4-10	REMOVAL OF EXISTING CONCRETE	1,380	SY	$ 16.40	$ 22,632
120-1	REGULAR EXCAVATION	3,213	CY	$ 14.00	$ 44,982
120-6	EMBANKMENT	946	CY	$ 16.50	$ 15,609
160-4	TYPE B STABILIZATION	10,415	SY	$ 5.10	$ 53,117
285-701	OPTIONAL BASE, BASE GROUP 01	8,280	SY	$ 5.30	$ 43,884
285-706	OPTIONAL BASE, BASE GROUP 06	42	SY	$ 51.50	$ 2,163
327-70-6	MILLING EXIST ASPH PAVT, 1 1/2" AVG DEPTH	51,622	SY	$ 2.90	$ 149,704
334-1-12	SUPERPAVE ASPHALTIC CONC, TRAFFIC B	4	TN	$ 110.60	$ 442
337-7-81	ASPHALT CONCRETE FRICTION COURSE,TRAFFIC B, FC-12.5, PG 76-22	4,944	TN	$ 148.70	$ 735,173
339-1	MISCELLANEOUS ASPHALT PAVEMENT	206	TN	$ 159.90	$ 32,939
350-30-13	CONCRETE PAVEMENT FOR ROUNDABOUT APRON, 12" DEPTH	62	SY	$ 281.70	$ 17,465
425-1-211	INLETS, CURB, TYPE 10, <10'	37	EA	$ 7,123.40	$ 263,566
425-1-351	INLETS, CURB, TYPE P-5, <10'	3	EA	$ 6,461.10	$ 19,383
425-1-352	INLETS, CURB, TYPE P-5, >10'	1	EA	$ 7,466.60	$ 7,467
425-1-361	INLETS, CURB, TYPE P-6, <10'	2	EA	$ 4,967.80	$ 9,936
425-1-521	INLETS, DT BOT, TYPE C,<10'	6	EA	$ 3,118.50	$ 18,711
425-1-523	INLETS, DT BOT, TYPE C,JBOT, <10'	8	EA	$ 5,609.10	$ 44,873
425-1-541	INLETS, DT BOT, TYPE D, <10'	1	EA	$ 4,410.00	$ 4,410
425-1-701	INLETS, GUTTER, TYPE S, <10'	1	EA	$ 4,683.30	$ 4,683
425-1-910	INLETS, CLOSED FLUME	2	EA	$ 4,677.60	$ 9,355
425-2-41	MANHOLES, P-7, <10'	4	EA	$ 5,055.20	$ 20,221
425-5	MANHOLE, ADJUST	11	EA	$ 812.90	$ 8,942
430-174-118	PIPE CULVERT, OPTIONAL MATERIAL, ROUND, 18"SD	429	LF	$ 75.00	$ 32,175
443-70-4	FRENCH DRAIN, 24"	1,301	LF	$ 158.20	$ 205,818
515-1-2	PIPE HANDRAIL - GUIDERAIL, ALUMINUM	535	LF	$ 25.20	$ 13,482
520-1-7	CONCRETE CURB & GUTTER, TYPE E	216	LF	$ 22.10	$ 4,774
520-1-10	CONCRETE CURB & GUTTER, TYPE F	1,850	LF	$ 17.20	$ 31,820
520-2-4	CONCRETE CURB, TYPE D	120	LF	$ 33.10	$ 3,972
522-1	CONCRETE SIDEWALK AND DRIVEWAYS, 4" THICK	2,049	SY	$ 36.60	$ 74,994
522-2	CONCRETE SIDEWALK AND DRIVEWAYS, 6" THICK	909	SY	$ 53.90	$ 48,999
527-2	DETECTABLE WARNINGS	854	SF	$ 25.40	$ 21,692
536-1-0	GUARDRAIL -ROADWAY, GENERAL/LOW SPEED TL-2	4,260	LF	$ 15.80	$ 67,308
536-1-1	GUARDRAIL -ROADWAY, GENERAL TL-3	750	LF	$ 17.40	$ 13,050
536-7-1	SPECIAL GUARDRAIL POST- DEEP POST FOR SLOPE BREAK CONDITION- TIMBER OR STEEL	336	EA	$ 53.20	$ 17,875
536-7-2	SPECIAL GUARDRAIL POST- SPECIAL STEEL POST FOR CONCRETE STRUCTURE MOUNT	40	EA	$ 307.70	$ 12,308
536-8-111	GUARDRAIL TRANSITION CONNECTION TO RIGID BARRIER, FURNISH AND INSTALL, NEW BRIDGE OR CONCRETE BARRIER, APPROACH , TL-2	3	EA	$ 2,800.00	$ 8,400
536-8-112	GUARDRAIL TRANSITION CONNECTION TO RIGID BARRIER, FURNISH AND INSTALL, NEW BRIDGE OR CONCRETE BARRIER, APPROACH TL-3	1	EA	$ 2,800.00	$ 2,800
536-8-113	GUARDRAIL TRANSITION CONNECTION TO RIGID BARRIER, FURNISH AND INSTALL, NEW BRIDGE OR CONCRETE BARRIER, TRAILING	2	EA	$ 2,405.00	$ 4,810
536-8-122	GUARDRAIL TRANSITION CONNECTION TO RIGID BARRIER, FURNISH AND INSTALL, EXISTING BRIDGE APPROACH TL-3	2	EA	$ 2,800.00	$ 5,600
536-8-123	GUARDRAIL TRANSITION CONNECTION TO RIGID BARRIER, FURNISH AND INSTALL, EXISTING BRIDGE, TRAILING	1	EA	$ 2,405.00	$ 2,405
536-73	GUARDRAIL REMOVAL	4,778	LF	$ 2.30	$ 10,989
536-85-20	GUARDRAIL END TREATMENT- TRAILING ANCHORAGE	1	EA	$ 1,115.00	$ 1,115
536-85-24	GUARDRAIL END TREATMENT- PARALLEL APPROACH TERMINAL	6	EA	$ 2,963.40	$ 17,780
544-2-2	CRASH CUSHION, TL-2, WIDE	1	EA	$ 27,031.50	$ 27,032
550-10-220	FENCING, TYPE B, 5.1-6.0', STANDARD	125	LF	$ 20.90	$ 2,613
550-60-212	FENCE GATE, TYPE B, SINGLE, 6.1 - 12.0' OPENING	1	EA	$ 539.10	$ 539
570-1-2	PERFORMANCE TURF, SOD	9,433	SY	$ 4.10	$ 38,677
999-25	INITIAL CONTINGENCY AMOUNT, DO NOT BID	1	LS		$ 50,000
				Sub-total Roadway	**$ 3,395,921**

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FM 441831-1, SR 826 Frontage Roads From NW 103rd Street to NW 122nd Street					
Signing and Pavement Markings					
700-1-11	SINGLE POST SIGN, F&I GROUND MOUNT, UP TO 12 SF	168	AS	$ 308.80	$ 51,878
700-1-12	SINGLE POST SIGN, F&I GROUND MOUNT, 12-20 SF	1	AS	$ 955.80	$ 956
700-1-60	SINGLE POST SIGN, REMOVE	167	AS	$ 24.70	$ 4,125
700-2-60	MULTI- POST SIGN, REMOVE	1	AS	$ 481.90	$ 482
700-3-501	SIGN PANEL, RELOCATE, UP TO 12 SF	44	EA	$ 154.80	$ 6,811
705-10-1	OBJECT MARKER, TYPE 1	28	EA	$ 213.20	$ 5,970
705-10-2	OBJECT MARKER, TYPE 2	1	EA	$ 126.80	$ 127
710-11-290	PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, ISLAND NOSE	25	SF	$ 1.80	$ 45
710-90	PAINTED PAVEMENT MARKINGS, FINAL SURFACE	1	LS	$ 16,363.66	$ 16,364
711-11-123	THERMOPLASTIC, STANDARD, WHITE, SOLID, 12" FOR CROSSWALK AND ROUNDABOUT	3,732	LF	$ 1.70	$ 6,344
711-11-124	THERMOPLASTIC, STANDARD, WHITE, SOLID, 18" FOR DIAGONALS AND CHEVRONS	27	LF	$ 2.50	$ 68
711-11-125	THERMOPLASTIC, STANDARD, WHITE, SOLID, 24" FOR STOP LINE AND CROSSWALK	600	LF	$ 3.50	$ 2,100
711-11-141	THERMOPLASTIC, STANDARD, WHITE, 2-4 DOTTED GUIDELINE/ 6-10 GAP EXTENSION, 6"	0.015	GM	$ 1,145.20	$ 17
711-11-160	THERMOPLASTIC, STANDARD, WHITE, MESSAGE OR SYMBOL	9	EA	$ 101.70	$ 915
711-11-170	THERMOPLASTIC, STANDARD, WHITE, ARROW	40	EA	$ 58.40	$ 2,336
711-11-180	THERMOPLASTIC, STANDARD, WHITE, YIELD LINE	26	LF	$ 2.70	$ 70
711-11-224	THERMOPLASTIC, STANDARD, YELLOW, SOLID, 18" FOR DIAGONAL OR CHEVRON	858	LF	$ 2.60	$ 2,231
711-14-125	THERMOPLASTIC, PREFORMED, WHITE, SOLID, 24" FOR CROSSWALK	759	LF	$ 16.40	$ 12,448
711-16-101	THERMOPLASTIC, STANDARD-OTHER SURFACES, WHITE, SOLID, 6"	5.529	GM	$ 4,168.90	$ 23,050
711-16-102	THERMOPLASTIC, STANDARD-OTHER SURFACES, WHITE, SOLID, 8"	0.153	GM	$ 4,969.50	$ 760
711-16-131	THERMOPLASTIC, STANDARD-OTHER SURFACES, WHITE, SKIP, 6",10-30 SKIP OR 3-9 LANE DROP	0.152	GM	$ 1,234.30	$ 188
711-16-133	THERMOPLASTIC, STANDARD-OTHER SURFACES WHITE, SKIP, 12"- APPROACH TO TOLL PLAZA OR 3-9 LANE DROP	0.049	GM	$ 1,907.60	$ 93
711-16-201	THERMOPLASTIC, STANDARD-OTHER SURFACES, YELLOW, SOLID, 6"	3.659	GM	$ 4,178.80	$ 15,288
711-16-231	THERMOPLASTIC, STANDARD-OTHER SURFACES, YELLOW, SKIP, 6"	0.966	GM	$ 1,400.60	$ 1,353
711-17-1	THERMOPLASTIC, REMOVE EXISTING THERMOPLASTIC PAVEMENT MARKINGS- SURFACE TO REMAIN	180	SF	$ 2.20	$ 396
713-103-101	PERMANENT TAPE, WHITE, SOLID, 6" FOR CONCRETE BRIDGES	0.034	GM	$ 23,633.10	$ 806
713-103-201	PERMANENT TAPE, YELLOW, SOLID, 6" FOR CONCRETE BRIDGES	0.034	GM	$ 24,038.60	$ 819
				Sub-total Signing and Pavement Markings	**$ 156,040**
Lump Sum Pay Item 710-90, Painted Pavement Markings, Final Surface					
706-1-1	*RAISED PAVEMENT MARKER, TYPE B WITHOUT FINAL SURFACE MARKINGS*	*1,180*	*EA*	*$ 4.30*	*$ 5,074*
710-11-101	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID, 6"*	*5.544*	*GM*	*$ 775.90*	*$ 4,302*
710-11-102	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR INTERCHANGE AND URBAN ISLAND, 8"*	*0.153*	*GM*	*$ 1,029.10*	*$ 157*
710-11-123	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR CROSSWALK AND ROUNDABOUT, 12"*	*3,732*	*LF*	*$ 0.50*	*$ 1,866*
710-11-124	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR DIAGONAL OR CHEVRON, 18"*	*27*	*LF*	*$ 0.80*	*$ 22*
710-11-125	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR STOP LINE OR CROSSWALK, 24"*	*600*	*LF*	*$ 1.10*	*$ 660*
710-11-131	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SKIP, 10-30 OR 3-9 SKIP, 6" WIDE*	*0.152*	*GM*	*$ 351.80*	*$ 53*
710-11-133	*PAINTED PAVEMENT MARKING, STANDARD,WHITE, 3'-9' SKIP DROP LINE AND APPROACH TO TOLL PLAZA, 12" WIDE,*	*0.049*	*GM*	*$ 1,151.90*	*$ 56*
710-11-141	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, 2-4 DOTTED GUIDELINE/ 6-10 DOTTED EXTENSION, 6"*	*0.015*	*GM*	*$ 495.20*	*$ 7*
710-11-180	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, YIELD LINE*	*22*	*LF*	*$ 3.70*	*$ 81*
710-11-224	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SOLID FOR DIAGONAL OR CHEVRON, 18"*	*858*	*LF*	*$ 1.00*	*$ 858*
710-11-201	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SOLID, 6"*	*3.697*	*GM*	*$ 763.40*	*$ 2,822*
710-11-231	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SKIP, 6"*	*0.966*	*GM*	*$ 418.20*	*$ 404*

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FM 441831-1, SR 826 Frontage Roads From NW 103rd Street to NW 122nd Street

Signalization					
630-2-12	CONDUIT, FURNISH & INSTALL, DIRECTIONAL BORE	925	LF	$ 19.80	$ 18,315
632-7-1	SIGNAL CABLE- NEW OR RECONSTRUCTED INTERSECTION, FURNISH & INSTALL	2	PI	$ 5,245.10	$ 10,490
635-2-11	PULL & SPLICE BOX, F&I, 13" x 24" COVER SIZE	22	EA	$ 711.60	$ 15,655
646-1-11	ALUMINUM SIGNALS POLE, PEDESTAL	8	EA	$ 1,219.80	$ 9,758
653-1-11	PEDESTRIAN SIGNAL, FURNISH & INSTALL LED COUNTDOWN, 1 WAY	4	AS	$ 849.90	$ 3,400
653-1-12	PEDESTRIAN SIGNAL, FURNISH & INSTALL LED COUNTDOWN, 2 WAYS	4	AS	$ 1,204.10	$ 4,816
653-1-60	PEDESTRIAN SIGNAL, REMOVE PED SIGNAL- POLE/PEDESTAL TO REMAIN	2	AS	$ 67.50	$ 135
660-2-106	LOOP ASSEMBLY, F&I, TYPE F	5	AS	$ 1,203.50	$ 6,018
660-4-11	VEHICLE DETECTION SYSTEM- VIDEO, FURNISH & INSTALL CABINET EQUIPMENT	6	EA	$ 6,720.00	$ 40,320
660-4-12	VEHICLE DETECTION SYSTEM- VIDEO, FURNISH & INSTALL ABOVE GROUND EQUIPMENT	8	EA	$ 2,679.80	$ 21,438
665-1-11	PEDESTRIAN DETECTOR, FURNISH & INSTALL, STANDARD	10	EA	$ 301.80	$ 3,018
665-1-60	PEDESTRIAN DETECTOR, REMOVE- POLE/PEDESTAL TO REMAIN	8	EA	$ 65.00	$ 520
670-5-400	TRAFFIC CONTROLLER ASSEMBLY, MODIFY	2	AS	$ 2,456.70	$ 4,913
				Sub-total Signalization	**$ 138,797**

Lighting					
630-2-12	CONDUIT, FURNISH & INSTALL, DIRECTIONAL BORE	2,350	LF	$ 19.80	$ 46,530
635-2-11	PULL & SPLICE BOX, F&I, 13" x 24" COVER SIZE	15	EA	$ 711.60	$ 10,674
715-1-13	LIGHTING CONDUCTORS, F&I, INSULATED, NO 4 TO NO 2	8,334	LF	$ 2.50	$ 20,835
715-4-12	LIGHT POLE COMPLETE, FURNISH & INSTALL STANDARD POLE STANDARD FOUNDATION, 35' MOUNTING HEIGHT	8	EA	$ 5,203.00	$ 41,624
715-4-14	LIGHT POLE COMPLETE, FURNISH & INSTALL STANDARD POLE STANDARD FOUNDATION, 45' MOUNTING HEIGHT	1	EA	$ 7,218.20	$ 7,218
715-5-21	LUMINAIRE & BRACKET ARM, REPLACE LUMINAIRE AND ARM ON EXISTING POLE	3	EA	$ 1,890.00	$ 5,670
715-11-211	LUMINAIRE, F&I- REPLACE EXISTING LUMINAIRE ON EXISTING POLE/ARM, ROADWAY, COBRA HEAD	4	EA	$ 1,422.90	$ 5,692
715-500-1	POLE CABLE DISTRIBUTION SYSTEM, FURNISH AND INSTALL, CONVENTIONAL	13	EA	$ 822.30	$ 10,690
				Sub-total Lighting	**$ 148,933**

Landscape					
581-1-2	RELOCATE TREES AND PALMS, PALM, >=14' OF CLEAR TRUNK	9	EA	$ 1,149.60	$ 10,346
				Sub-total Landscape	**$ 10,346**

Structures - Bridge 870569 (West)					
104-11	FLOATING TURBIDITY BARRIER	150	LF	$ 17.20	$ 2,580
110-3	REMOVAL OF EXISTING STRUCTURES/BRIDGES	323	SF	$ 31.70	$ 10,239
400-2-4	CONC CLASS II, BRIDGE SUPERSTRUCTURE	18	CY	$ 813.80	$ 14,648
400-2-10	CONCRETE CLASS II, APPROACH SLABS	6	CY	$ 2,205.00	$ 12,392
415-1-4	REINFORCING STEEL - BRIDGE SUPERSTRUCTURE	3,560	LB	$ 10.50	$ 37,380
415-1-9	REINFORCING STEEL- APPROACH SLABS	1,123	LB	$ 7.90	$ 8,872
458-1-11	BRIDGE DECK EXPANSION JOINT, NEW CONSTRUCTION, F&I POURED JOINT WITH BACKER ROD	8	LF	$ 92.30	$ 738
515-4-1	BULLET RAIL, SINGLE RAIL	90	LF	$ 30.60	$ 2,754
521-5-4	CONCRETE TRAFFIC RAILING- BRIDGE, 32" VERTICAL FACE	174	LF	$ 118.60	$ 20,636
521-5-8	CONCRETE TRAFFIC RAILING- BRIDGE,RETROFIT-VERTICAL FACE	90	LF	$ 63.00	$ 5,670
				Sub-total Structures - Bridge 870569 (West)	**$ 115,910**

Structures - Bridge 870570 (East)					
458-1-11	BRIDGE DECK EXPANSION JOINT, NEW CONSTRUCTION, F&I POURED JOINT WITH BACKER ROD	76	LF	$ 92.30	$ 7,015
521-5-4	CONCRETE TRAFFIC RAILING- BRIDGE, 32" VERTICAL FACE	60	LF	$ 118.60	$ 7,116
				Sub-total Structures - Bridge 870570 (East)	**$ 14,131**

Grand Total					**$ 3,980,078**
Unit Prices from FDOT Item Average Unit Costs, either Area 13 or Statewide Averages (10/2019-9/2020)					

Preliminary Construction Cost Estimate

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FM 441830-1, SR 826 Frontage Roads From Okeechobee Road to NW 103rd Street

Pay Item	Decription	Quantity	Unit	Unit Price	Total
Roadway					
0-30-1	DESIGN COST FOR DESIGN BUILD PROJECTS: ESTIMATES USE ONLY (44183015201DB)	1	LS	10%	$ 142,885
101-1	MOBILIZATION	1	LS	8%	$ 91,369
102-1	MAINTENANCE OF TRAFFIC	100	DA	10%	$ 114,211
102-60	WORK ZONE SIGN	8,000	ED	$ 0.30	$ 2,400
102-71-16	TEMPORARY BARRIER, F&I, FREE STANDING	570	LF	$ 10.80	$ 6,156
102-71-26	TEMPORARY BARRIER, RELOCATE, FREE STANDING	1,140	LF	$ 4.30	$ 4,902
102-74-1	CHANNELIZING DEVICE- TYPES I, II, DI, VP, DRUM, OR LCD	23,000	ED	$ 0.20	$ 4,600
102-74-8	CHANNELIZING DEVICE- PEDESTRIAN LCD (LONGITUDINAL CHANNELIZING DEVICE)	40,000	FD	$ 0.20	$ 8,000
102-76	ARROW BOARD / ADVANCE WARNING ARROW PANEL	770	ED	$ 6.20	$ 4,774
102-89-1	TEMPORARY CRASH CUSHION, REDIRECTIVE OPTION	12	LO	$ 932.60	$ 11,191
102-99	PORTABLE CHANGEABLE MESSAGE SIGN, TEMPORARY	1,416	ED	$ 11.70	$ 16,567
102-115	TYPE III BARRICADE	1,200	ED	$ 0.40	$ 480
104-18	INLET PROTECTION SYSTEM	52	EA	$ 137.20	$ 7,134
107-1	LITTER REMOVAL	1.33	AC	$ 11.70	$ 16
107-2	MOWING	0.51	AC	$ 19.80	$ 10
110-1-1	CLEARING & GRUBBING	2.38	AC	$ 20,000.00	$ 47,600
110-2-2	SELECTIVE CLEARING AND GRUBBING, AREAS WITH TREES TO REMAIN	0.08	AC	$ 37,129.60	$ 2,970
110-4-10	REMOVAL OF EXISTING CONCRETE	465	SY	$ 16.40	$ 7,626
110-21	TREE PROTECTION BARRIER	1,920	LF	$ 1.90	$ 3,648
120-1	REGULAR EXCAVATION	1,876	CY	$ 14.00	$ 26,264
120-6	EMBANKMENT	552	CY	$ 16.50	$ 9,108
160-4	TYPE B STABILIZATION	4,853	SY	$ 5.10	$ 24,750
285-701	OPTIONAL BASE, BASE GROUP 01	3,693	SY	$ 5.30	$ 19,573
285-706	OPTIONAL BASE, BASE GROUP 06	594	SY	$ 51.50	$ 30,591
327-70-6	MILLING EXIST ASPH PAVT, 1 1/2" AVG DEPTH	21,317	SY	$ 2.90	$ 61,819
334-1-12	SUPERPAVE ASPHALTIC CONC, TRAFFIC B	157	TN	$ 110.60	$ 17,364
337-7-81	ASPHALT CONCRETE FRICTION COURSE,TRAFFIC B, FC-12.5, PG 76-22	2,113	TN	$ 148.70	$ 314,203
339-1	MISCELLANEOUS ASPHALT PAVEMENT	8	TN	$ 159.90	$ 1,279
425-1-351	INLETS, CURB, TYPE P-5, <10'	2	EA	$ 6,461.10	$ 12,922
425-1-523	INLETS, DT BOT, TYPE C,JBOT, <10'	5	EA	$ 5,609.10	$ 28,046
425-1-541	INLETS, DT BOT, TYPE D, <10'	10	EA	$ 4,410.00	$ 44,100
425-1-701	INLETS, GUTTER, TYPE S, <10'	2	EA	$ 4,683.30	$ 9,367
425-1-921	INLETS, ADJACENT BARRIER, <=10'	1	EA	$ 7,410.90	$ 7,411
425-2-41	MANHOLES, P-7, <10'	1	EA	$ 5,055.20	$ 5,055
425-5	MANHOLE, ADJUST	10	EA	$ 812.90	$ 8,129
430-174-118	PIPE CULVERT, OPTIONAL MATERIAL, ROUND, 18"SD	4	LF	$ 75.00	$ 300
436-1-1	TRENCH DRAIN, STANDARD	396	LF	$ 273.40	$ 108,266
443-70-4	FRENCH DRAIN, 24"	465	LF	$ 158.20	$ 73,563
515-1-2	PIPE HANDRAIL - GUIDERAIL, ALUMINUM	20	LF	$ 25.20	$ 504
520-1-7	CONCRETE CURB & GUTTER, TYPE E	57	LF	$ 22.10	$ 1,260
520-1-10	CONCRETE CURB & GUTTER, TYPE F	1,067	LF	$ 17.20	$ 18,352
522-1	CONCRETE SIDEWALK AND DRIVEWAYS, 4" THICK	934	SY	$ 36.60	$ 34,181
522-2	CONCRETE SIDEWALK AND DRIVEWAYS, 6" THICK	547	SY	$ 53.90	$ 29,505
527-2	DETECTABLE WARNINGS	334	SF	$ 25.40	$ 8,484
536-1-1	GUARDRAIL -ROADWAY, GENERAL TL-3	205	LF	$ 17.40	$ 3,567
536-8-122	GUARDRAIL TRANSITION CONNECTION TO RIGID BARRIER, FURNISH AND INSTALL, EXISTING BRIDGE APPROACH TL-3	1	EA	$ 2,800.00	$ 2,800
536-73	GUARDRAIL REMOVAL	57	LF	$ 2.30	$ 131
536-85-24	GUARDRAIL END TREATMENT- PARALLEL APPROACH TERMINAL	1	EA	$ 2,963.40	$ 2,963
544-2-2	CRASH CUSHION, TL-2, WIDE	1	EA	$ 27,031.50	$ 27,032
570-1-2	PERFORMANCE TURF, SOD	6,780	SY	$ 4.10	$ 27,800
999-25	INITIAL CONTINGENCY AMOUNT, DO NOT BID	1	LS		$ 50,000
				Sub-total Roadway	**$ 1,485,229**

Preliminary Construction Cost Estimate

Revised 11/25/2020

FM 441830-1, SR 826 Frontage Roads From Okeechobee Road to NW 103rd Street

Signing and Pavement Markings					
700-1-11	SINGLE POST SIGN, F&I GROUND MOUNT, UP TO 12 SF	36	AS	$ 308.80	$ 11,117
700-1-12	SINGLE POST SIGN, F&I GROUND MOUNT, 12-20 SF	8	AS	$ 955.80	$ 7,646
700-1-60	SINGLE POST SIGN, REMOVE	22	AS	$ 24.70	$ 543
700-2-60	MULTI- POST SIGN, REMOVE	2	AS	$ 481.90	$ 964
700-3-501	SIGN PANEL, RELOCATE, UP TO 12 SF	18	EA	$ 154.80	$ 2,786
700-3-601	SIGN PANEL, REMOVE, UP TO 12 SF	1	EA	$ 75.80	$ 76
705-10-1	OBJECT MARKER, TYPE 1	1	EA	$ 213.20	$ 213
710-90	PAINTED PAVEMENT MARKINGS, FINAL SURFACE	1	LS	$ 6,207.10	$ 6,207
711-11-123	THERMOPLASTIC, STANDARD, WHITE, SOLID, 12" FOR CROSSWALK AND ROUNDABOUT	1,910	LF	$ 1.70	$ 3,247
711-11-124	THERMOPLASTIC, STANDARD, WHITE, SOLID, 18" FOR DIAGONALS AND CHEVRONS	42	LF	$ 2.50	$ 105
711-11-125	THERMOPLASTIC, STANDARD, WHITE, SOLID, 24" FOR STOP LINE AND CROSSWALK	191	LF	$ 3.50	$ 669
711-11-141	THERMOPLASTIC, STANDARD, WHITE, 2-4 DOTTED GUIDELINE/ 6-10 GAP EXTENSION, 6"	0.007	GM	$ 1,145.20	$ 8
711-11-160	THERMOPLASTIC, STANDARD, WHITE, MESSAGE OR SYMBOL	5	EA	$ 101.70	$ 509
711-11-170	THERMOPLASTIC, STANDARD, WHITE, ARROW	5	EA	$ 58.40	$ 292
711-11-224	THERMOPLASTIC, STANDARD, YELLOW, SOLID, 18" FOR DIAGONAL OR CHEVRON	146	LF	$ 2.60	$ 380
711-11-241	THERMOPLASTIC, STANDARD, YELLOW, 2-4 DOTTED GUIDE LINE /6-10 DOTTED EXTENSION LINE, 6"	0.015	GM	$ 1,086.70	$ 16
711-14-125	THERMOPLASTIC, PREFORMED, WHITE, SOLID, 24" FOR CROSSWALK	140	LF	$ 16.40	$ 2,296
711-16-101	THERMOPLASTIC, STANDARD-OTHER SURFACES, WHITE, SOLID, 6"	2.476	GM	$ 4,168.90	$ 10,322
711-16-131	THERMOPLASTIC, STANDARD-OTHER SURFACES, WHITE, SKIP, 6",10-30 SKIP OR 3-9 LANE DROP	0.107	GM	$ 1,234.30	$ 132
711-16-201	THERMOPLASTIC, STANDARD-OTHER SURFACES, YELLOW, SOLID, 6"	1.782	GM	$ 4,178.80	$ 7,447
711-16-231	THERMOPLASTIC, STANDARD-OTHER SURFACES, YELLOW, SKIP, 6"	0.266	GM	$ 1,400.60	$ 373
				Sub-total Signing and Pavement Markings	**$ 55,347**
Lump Sum Pay Item 710-90, Painted Pavement Markings, Final Surface					
706-1-1	*RAISED PAVEMENT MARKER, TYPE B WITHOUT FINAL SURFACE MARKINGS*	*331*	*EA*	*$ 4.30*	*$ 1,423*
710-11-101	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID, 6"*	*2.476*	*GM*	*$ 775.90*	*$ 1,921*
710-11-123	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR CROSSWALK AND ROUNDABOUT, 12"*	*1,910*	*LF*	*$ 0.50*	*$ 955*
710-11-124	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR DIAGONAL OR CHEVRON, 18"*	*42*	*LF*	*$ 0.80*	*$ 34*
710-11-125	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SOLID FOR STOP LINE OR CROSSWALK, 24"*	*191*	*LF*	*$ 1.10*	*$ 210*
710-11-131	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, SKIP, 10-30 OR 3-9 SKIP, 6" WIDE*	*0.107*	*GM*	*$ 351.80*	*$ 38*
710-11-141	*PAINTED PAVEMENT MARKINGS, STANDARD, WHITE, 2-4 DOTTED GUIDELINE/ 6-10 DOTTED EXTENSION, 6"*	*0.007*	*GM*	*$ 495.20*	*$ 3*
710-11-201	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SOLID, 6"*	*1.782*	*GM*	*$ 763.40*	*$ 1,360*
710-11-224	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SOLID FOR DIAGONAL OR CHEVRON, 18"*	*146*	*LF*	*$ 1.00*	*$ 146*
710-11-231	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, SKIP, 6"*	*0.266*	*GM*	*$ 418.20*	*$ 111*
710-11-241	*PAINTED PAVEMENT MARKINGS, STANDARD, YELLOW, 2-4 DOTTED GUIDELINE/6-10 DOTTED EXTENSION, 6"*	*0.015*	*GM*	*$ 349.60*	*$ 5*

Lighting					
630-2-12	CONDUIT, FURNISH & INSTALL, DIRECTIONAL BORE	180	LF	$ 19.80	$ 3,564
635-2-11	PULL & SPLICE BOX, F&I, 13" x 24" COVER SIZE	4	EA	$ 711.60	$ 2,846
715-1-13	LIGHTING CONDUCTORS, F&I, INSULATED, NO 4 TO NO 2	636	LF	$ 2.50	$ 1,590
715-4-12	LIGHT POLE COMPLETE, FURNISH & INSTALL STANDARD POLE STANDARD FOUNDATION, 35' MOUNTING HEIGHT	1	EA	$ 5,203.00	$ 5,203
715-4-14	LIGHT POLE COMPLETE, FURNISH & INSTALL STANDARD POLE STANDARD FOUNDATION, 45' MOUNTING HEIGHT	1	EA	$ 7,218.20	$ 7,218
715-11-211	LUMINAIRE, F&I- REPLACE EXISTING LUMINAIRE ON EXISTING POLE/ARM, ROADWAY, COBRA HEAD	2	EA	$ 1,422.90	$ 2,846
715-500-1	POLE CABLE DISTRIBUTION SYSTEM, FURNISH AND INSTALL, CONVENTIONAL	4	EA	$ 822.30	$ 3,289
				Sub-total Lighting	**$ 26,557**

Landscape					
581-1-2	RELOCATE TREES AND PALMS, PALM, >=14' OF CLEAR TRUNK	4	EA	$ 1,149.60	$ 4,598
				Sub-total Landscape	**$ 4,598**

Grand Total	**$ 1,571,731**
Unit Prices from FDOT Item Average Unit Costs, either Area 13 or Statewide Averages (10/2019-9/2020)	

Appendix D

Utility Design Ticket

Ticket : 253006766 Rev:000 Taken: 09/09/20 16:03ET

State: FL Cnty: DADE GeoPlace: HIALEAH
CallerPlace: HIALEAH
Subdivision:

Address :
Street : SR 826
Cross 1 : NW 35TH TER
Within 1/4 mile: Y
Cross 2 : NW 154TH ST

Locat: LOCATE BOTH SIDES OF SR 826 FROM NW 35TH TER TO NW 154TH ST
:
Remarks : IN RESPONSE TO RECEIPT OF A DESIGN TICKET, SSOCOF PROVIDES THE ORIGINATOR OF THE DESIGN TICKET WITH A LIST OF SSOCOF MEMBERS IN THE VICINITY OF THE DESIGN PROJECT. SSOCOF DOES NOT NOTIFY SSOCOF MEMBERS OF THE RECEIPT BY SSOCOF OF A DESIGN TICKET. IT IS THE SOLE RESPONSIBILITY OF THE DESIGN ENGINEER TO CONTACT SSOCOF MEMBERS TO REQUEST INFORMATION ABOUT THE LOCATION OF SSOCOF MEMBERS' UNDERGROUND FACILITIES. SUBMISSION OF A DESIGN TICKET WILL NOT SATISFY THE REQUIREMENT OF CHAPTER 556, FLORIDA STATUTES, TO NOTIFY SSOCOF OF AN INTENT TO EXCAVATE OR DEMOLISH. THAT INTENT MUST BE MADE KNOWN SPECIFICALLY TO SSOCOF IN THE MANNER REQUIRED BY LAW. IN AN EFFORT TO SAVE TIME ON FUTURE CALLS, SAVE YOUR DESIGN TICKET NUMBER IF YOU INTEND TO BEGIN EXCAVATION WITHIN 90 DAYS OF YOUR DESIGN REQUEST. THE DESIGN TICKET CAN BE REFERENCED, AND THE INFORMATION ON IT CAN BE USED TO SAVE TIME WHEN YOU CALL IN THE EXCAVATION REQUEST.
*** LOOKUP BY MANUAL ***
:
Grids : 2554A8019B 2554A8019C 2554B8019B 2554B8019C 2555B8014A
Grids : 2555B8015A 2555B8015B 2555B8015C 2555B8015D 2555B8016A
Grids : 2555B8016B 2555B8016C 2555B8016D 2555B8017A 2555B8017B
Grids : 2555B8017C 2555B8017D 2555B8018A 2555B8018B 2555B8018C
Grids : 2555B8018D 2555B8019C 2555B8019D 2555C8017A 2555C8017B
Grids : 2555C8017C 2555C8018A 2555C8018B 2555C8018C 2555C8018D
Grids : 2555C8019B 2555C8019C 2555C8019D 2555D8019B 2555D8019C

Work date: 09/09/20 Time: 15:56ET Hrs notc: 000 Category: 6 Duration: UNKNOWN
Due Date : 09/11/20 Time: 23:59ET Exp Date : 10/09/20 Time: 23:59ET
Work type: DESIGN Boring: N White-lined: N
Ug/Oh/Both: U Machinery: N Depth: UNK Permits: N N/A
Done for : DESIGN

Company : FDOT Type: MEMB
Co addr : 1000 NW 111TH AVE
City : MIAMI State: FL Zip: 33172
Caller : LISANDRA FUENTES Phone: 305-470-5232
BestTime: 8-5
Email : LISANDRA.FUENTES@DOT.STATE.FL.US

Submitted: 09/09/20 16:03ET Oper: EVE
Mbrs : ALLIN1 AMTV01 AT1931 CC1279 CC2356 CITYGS DCPWT EVGPPL FDOT06 FGT01
Mbrs : FPLDAD HC1660 L3C900 MC2278 MCIU01 MDWS ML1426 NMBPU NN1882 SBF23
Mbrs : SP1898

Service Area	Utility Type(s)	Contact	Alt. Contact	Emergency Contact	Positive Response
SSOCOF TEST CODE - DO NOT READ TO CALLER ALLIN1 * Test/In-House	SSOCOF TEST CODE				Call Center Test Destination - The member code affiliated with this code is a test code - please disregard this response
ATLANTIC BROADBAND AMTV01	CABLE	PETE FREYTAG (305) 861-8069 x5208	PETE FREYTAG (305) 861-8069 x5208	PETE FREYTAG (305) 861-8069 x5208	
AMERICAN TRAFFIC SOLUTIONS AT1931	COMMUNICATION LINES, ELECTRIC	VICTORIA GRASSER (480) 596-4559	IT HELP DESK (866) 382-8689	IT HELP DESK (866) 382-8689	
COMCAST CABLE CC1279	CATV, FIBER	LEONARD MAXWELL-NEWBOLD (754) 221-1254		USIC DISPATCH (800) 778-9140	
CCI MONITOR CC2356 * New	FIBER	FIBER DIG TEAM (888) 632-0931 x2		FIBER NOC (855) 933-4237 x1	
FLORIDA CITY GAS CITYGS	NATURAL GAS	GUSTAVO PENA (305) 835-3624	RICHARD WILLIAMS (772) 359-1184	ALEX FARIAS (305) 835-3603	
DADE COUNTY PUBLIC WORKS AND TRAFFIC DCPWT	STREET LIGHTS, TRAFFIC SIGNALS	OCTAVIO VIDAL (305) 412-0891 x102	OCTAVIO VIDAL (305) 412-0891 x102	FRANK AIRA P.E. (305) 592-3580 x233	
BUCKEYE PIPELINE CO EVGPPL	GAS	DANIEL MANGUM (832) 541-3946	TRACI MCCLERNON (610) 904-4475	GARY WURSTER (954) 522-8464	
FLORIDA DEPARTMENT OF TRANSPORTATION VI ITS FDOT06	FIBER	THOMAS MILLER (305) 470-5757 x7352	IT ADMIN (305) 470-5757 x7340	ANTONIO VALLADARES (561) 703-1113	
FLORIDA GAS TRANSMISSION FGT01	GAS	JOSEPH E. SANCHEZ (407) 838-7171	LORENZO MENENDEZ (954) 214-5446	LYNN E IRVIN (407) 838-7656	
FLORIDA POWER & LIGHT--DADE FPLDAD	ELECTRIC	EDGAR AGUILAR (386) 586-6403		USIC DISPATCH CENTER (800) 778-9140	
HOTWIRE COMMUNICATIONS HC1660	CATV, FIBER, TELEPHONE	WALTER DAVILA (954) 699-0900	RALPH HERRERA (954) 628-7023	NOC / OAIS HASSANZADA (CALL IF NO RESPONSE FROM NOC) (561) 288-9188 x6	
CENTURYLINK L3C900	FIBER	NETWORK RELATIONS (877) 366-8344 x2	TECH ON DUTY (877) 366-8344 x3	TECH ON DUTY (877) 366-8344 x3	
MASTEC INC MC2278	FIBER	RICKIE QUINN		JULIO OLEA (305) 803-0346	
MCI MCIU01	COMMUNICATION LINES, FIBER	MCIU01 INVESTIGATIONS (469) 886-4091	NATIONAL FIBER SECURITY DEPARTMENT (800) 624-9675	NATIONAL FIBER SECURITY DEPARTMENT (800) 624-9675	
MIAMI-DADE WATER & SEWER MDWS	SEWER, WATER	LAZARO GUERRA (786) 268-5273		RADIO COMMUNICATION CENTER (305) 274-9272	
TOWN OF MIAMI LAKES ML1426	IRRIGATION, STREET LIGHTS		LUIS SANCHEZ (305) 364-6100	LUIS SANCHEZ (305) 364-6100	

NMB WATER/JACOBS NMBPU	SEWER, WATER	KARIM ROSSY (305) 948-2980 x7962		JOHN POLLARD (305) 218-1484
CROWN CASTLE NG NN1882	FIBER	FIBERDIG TEAM (888) 632-0931 x2		CROWN CASTLE FIBER NOC (855) 933-4237 x1
A T & T/ DISTRIBUTION SBF23	TELEPHONE	DINO FARRUGGIO (561) 997-0240	USIC DISPATCH OFFICE (CLS) (800) 778-9140	USIC DISPATCH OFFICE (CLS) (800) 778-9140
SUBURBAN PROPANE SP1898	PROPANE GAS	DMITRY PRESSMAN (305) 635-4427 x102	DMITRY PRESSMAN (305) 635-4427 x102	DMITRY PRESSMAN (305) 635-4427 x102