



OLD Engineering Services and I-85 Widening DB and GEC Industry Forum

December 15, 2016

Darryl VanMeter, PE – State Innovative Delivery Administrator

Chip Meeks – DB Acquisition Manager

Curtis Scott – Engineering Services Acquisition Manager

Andrew Hoenig, PE – Senior DB Project Manager

Tim Matthews, PE – Senior DB Project Manager



Disclaimer Statement

At this meeting the Department will provide information about the project's delivery goals, anticipated scope, anticipated Design-Build procurement process, and potential risks.

Participants will be encouraged to ask questions during this meeting; however, **any information provided by the Department shall be considered as informational only and is subject to change.**



Agenda

- MMIP, Engineering Services, and Design-Build Opportunities
- Engineering Services for Office of Innovative Delivery (OID)
- I-85 Widening Hamilton Rd to SR 211 GEC
- I-85 Widening Hamilton Rd to SR 211 DB Contract
- Open Discussion



Georgia **Your**
Dollar\$
Building
A Better
Georgia

[Learn More](#)

Major Mobility Investment Program –
Meeting the Governor’s Promise to Georgians



High Expectations for MMIP

MMIP Goals

- Support economic development throughout the state of Georgia
- Improve mobility for people, goods and freight in key transportation corridors statewide, including the metro Atlanta region
- Relieve traffic congestion and improve travel reliability for improved quality of life

“We are about to embark on a 10-year journey into Georgia’s future.”

“We promised the people of the state of Georgia that we would show them results. And that is what we’re doing today.”

- Governor Nathan Deal



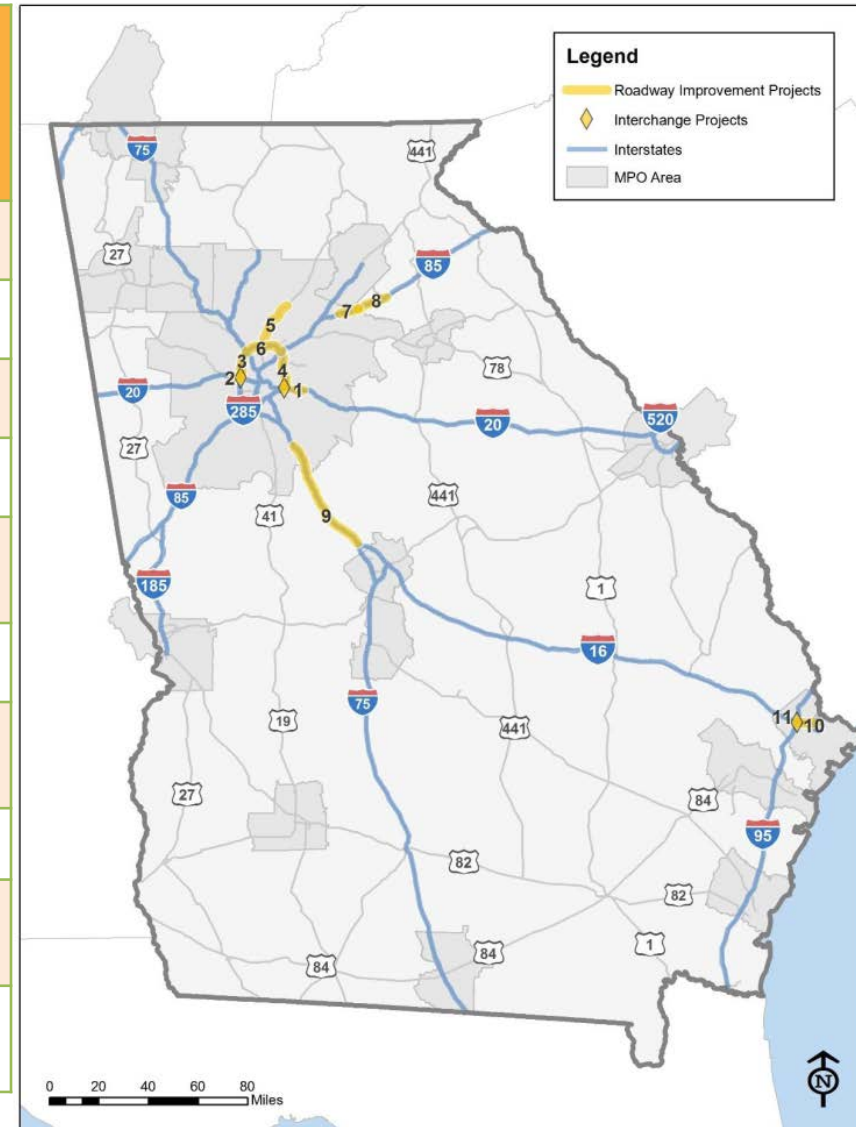
“It will be transformational for Georgia in the short term and the long term.”

- GDOT Commissioner
Russell McMurry



MMIP Proposed Projects

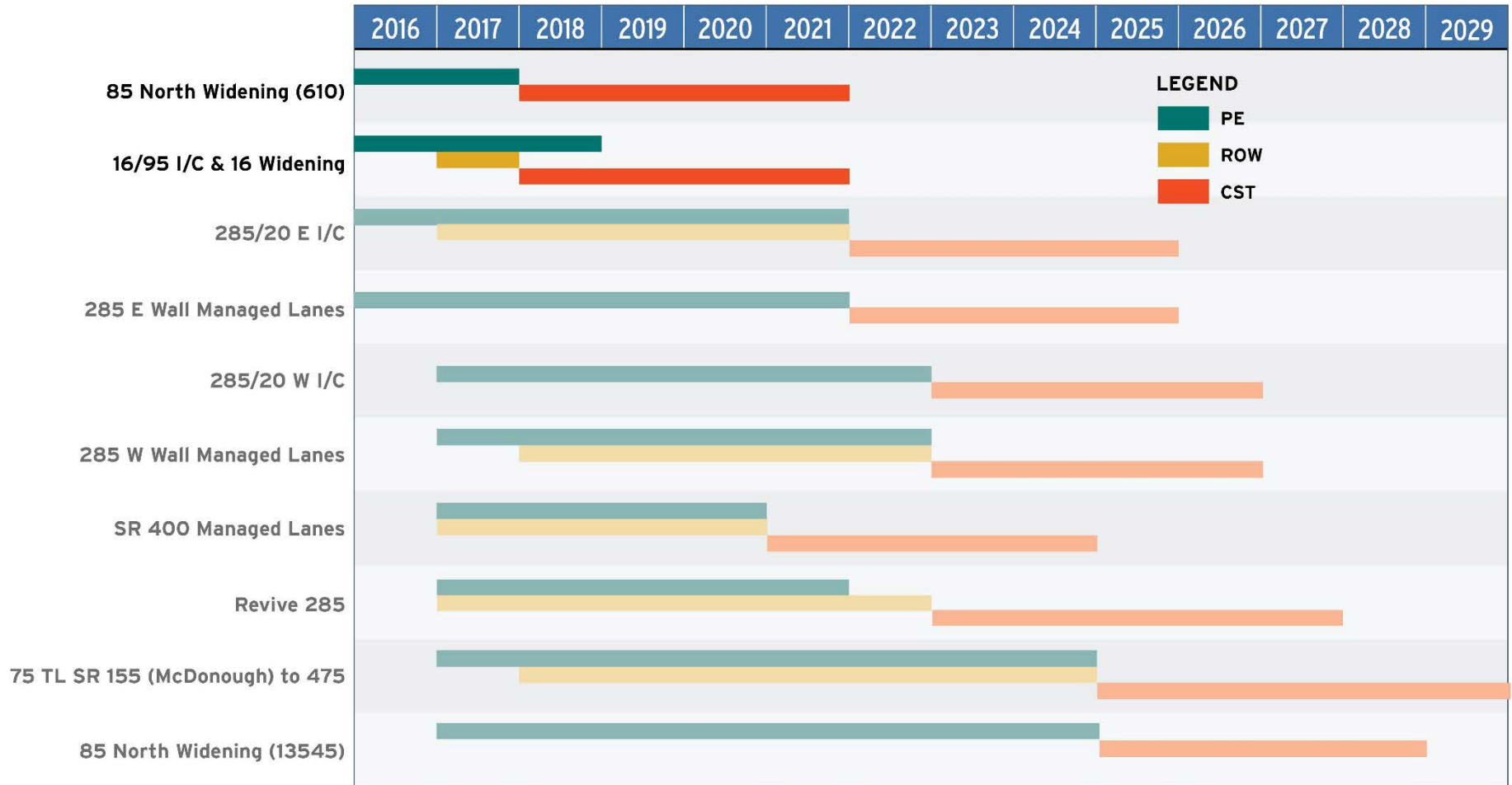
Roadway Improvement Projects		Total Project \$ Estimate (Millions)
1	I-285/I-20 East Interchange	\$475
2	I-285/I-20 West Interchange	\$790
3	I-285 West Wall Express Lanes, I-20 to I-75	\$655
4	I-285 East Wall Express Lanes, I-85 to I-20	\$580
5	SR 400 Express Lanes; I-285 to McGinnis Ferry Road	\$1,800
6	Revive 285, Express Lanes I-75 to I-85	\$4,200
7	I-85 North Widening; Hamilton Mill to SR 211	\$135
8	I-85 North Widening; SR 211 to US 129	\$305
9	I-75 NB Truck Lanes; SR 155 (McDonough) to I-475	\$1,800
10 & 11	I-16/I-95 and I-16 Interchange I-16 Widening; I-95 to I-516	\$315



Estimates are escalated to YOE and do not include financing



MMIP Delivery Schedule - Proposed



Schedule subject to change



OID Engineering Services

- Opportunities Posted on GDOT OID Webpage

Project	P.I. Number	County	PNA Advertisement	Industry Forum	RFQ Advertisement	Anticipated Award
Engineering Sevices for Office of Innovative Delivery DB and P3	N/A	Statewide	11/16/2016	12/15/2016	12/30/2016	3/17/2017
I-85 Widening CR 134/Hamilton Mill Road to SR 211 (Post-Let GEC including CEI)	110610-	Gwinnett Barrow	11/16/2016	12/15/2016	12/30/2016	3/17/2017
DB Program CEI #1	N/A	Northern Counties	Apr-2017	Apr-2017	May-2017	Oct-2017
DB Program CEI #2	N/A	Southern Counties	Apr-2017	Apr-2017	May-2017	Oct-2017
ROW and Utility GEC Support for Office of Innovative Delivery	N/A	Statewide	Apr-2017	Apr-2017	May-2017	Oct-2017
I-16/I-95 Interchange & I-16 Widening (Post-Let GEC including CEI)	0012758	Chatham	Jun-2017	Jul-2017	Jul-2017	Dec-2017
	0012757					



Design-Build Delivery

- Opportunities Posted on GDOT OID Webpage

Project	P.I. Number	County	Length (miles)	PNA Advertisement	RFQ Advertisement	RFP Advertisement	Letting	Anticipated Selection Method	GDOT's Public SharePoint Site
FY 17 Design-Build Bridge Replacement Projects	Various	Statewide	-	11/2/2016	2/3/2017	4/21/2017	6/16/2017	Two Phase Low Bid	Link
I-85 Corridor Bridges	TBD	Jackson/ Franklin	-	11/2/2016	2/3/2017	4/21/2017	6/16/2017	Two Phase Low Bid	Link
CS 1868/Courtland Street @ CSX RR/MARTA/Decatur Street	752015-	Fulton	0.25	11/10/2016	1/20/2017	3/24/2017	7/21/2017	Best Value	Link
I-85 Widening CR 134/Hamilton Mill Road to SR 211	110610-	Gwinnett/ Barrow	12.7	11/16/2016	3/24/2017	5/26/2017	9/15/2017	Best Value	Link
Redwine Road & Starrs Mill School Complex Multi-Use Path	0012624	Fayette	1.0	Spring 2017	-	Summer 2017	Fall 2017	One Phase Low Bid	Link
I-16 @ I-95 Interchange Reconstruction Incl I-16 Widening from I-95 to I-515	0012758 0012757	Chatham	7.5	Fall 2017	Winter 2017	Spring 2018	Summer 2018	Best Value	Link
I-20 @ Savannah River Bridge	210327-	Richmond	1.8	TBD	TBD	TBD	TBD	Best Value	Link
SR 53 WB @ Chattahoochee River	0010212	Hall	0.4	TBD	TBD	TBD	TBD	TBD	Link
SR 135 @ Altamaha River - TIA	0007037	Jeff Davis Montgomery	0.8	TBD	TBD	TBD	TBD	TBD	Link
I-985 From I-85/Gwinnett to SR 53/Hall	0014130	Gwinnett/ Hall	16	TBD	TBD	TBD	TBD	TBD	Link
I-85 Widening SR 211 to SR 11/US 129	0013545	Barrow/ Jackson	11.3	Winter 2023	Spring 2024	Spring 2024	Summer 2024	Best Value	Link



Contracting

- **1 Design-Build Contract (Office of Innovative Delivery)**
 - Combines preconstruction-related services with construction services into **one contract**
 - Allows the contractor to participate in the project's design in an effort to **reduce costs, improve communication and expedite project delivery**
 - Governed by
 - 23 Code of Federal Regulations (CFR) Part 636
 - Georgia Code Section 32-2-81 (*Enacted 2004*)
 - Board Rules, Chapter 672-18 (*Adopted 2006 & 2013*)
- **2 Engineering Services Contracts (Procurement Office)**
 - Governed by:
 - 23 Code of Federal Regulations (CFR) Part 172
 - Georgia Code Section 50-22-1 thru 50-22-9
 - 40 U.S.C. 1101-1104 Section of Architects and Engineers "Brooks Act"

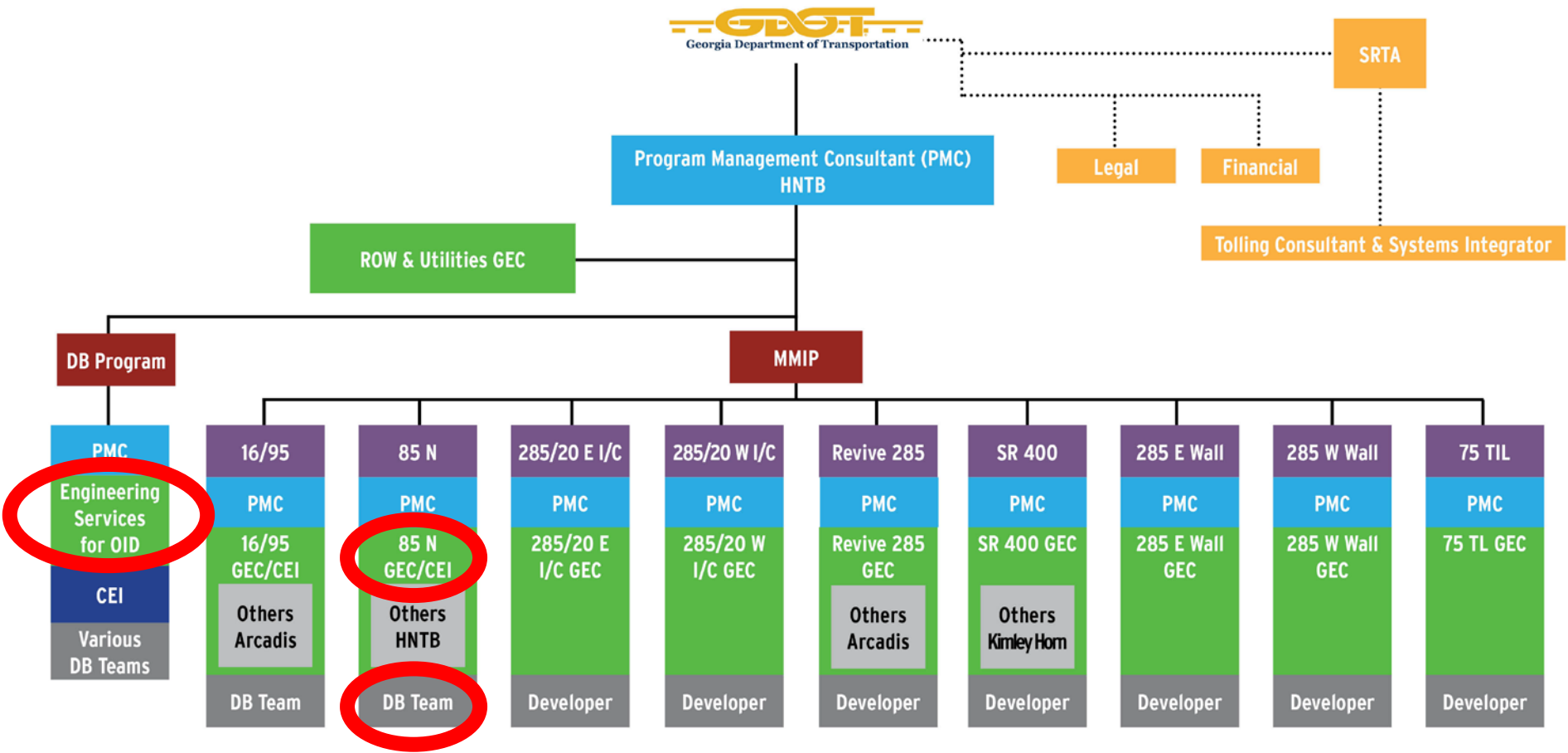


Engineering Services for Office of Innovative Delivery DB and P3

Andrew Hoenig, PE
Senior DB Project Manager



Program Delivery Model- PMC/GEC





Opportunity Conflict

1. Engineering Services for Office of Innovative Delivery DB and P3
2. DB Team for various DB Projects (non-MMIP)
3. DB Program CEI for various DB Projects (non-MMIP)
4. I-85 Widening MMIP Corridor GEC
5. I-85 Widening MMIP Corridor DB Team

Allowable

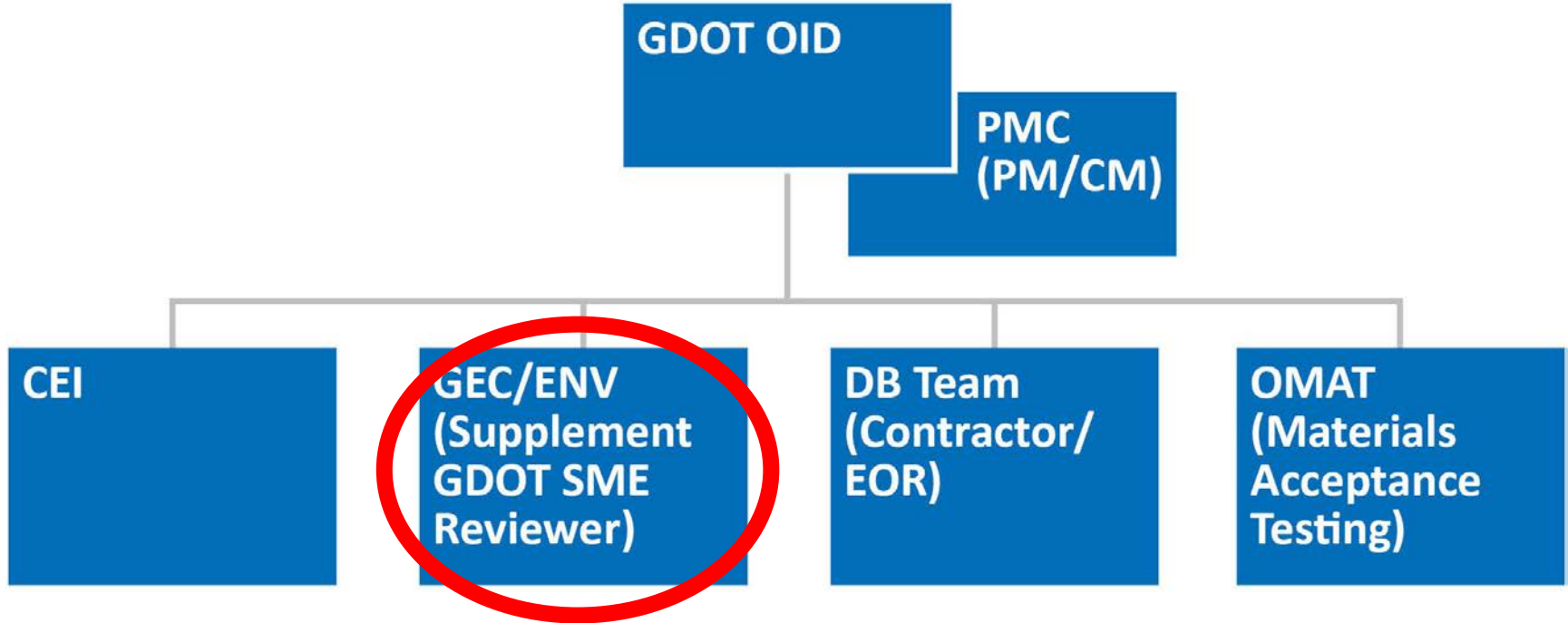
- 1, 3, and 4
- 1, 3, and 5
- 2 and 4
- 2 and 5

Not Allowable

- 1 and 2
- 4 and 5



Organizational Chart for Engineering Services for Office of Innovative Delivery DB and P3





Opportunity Overview

- **Engineering Services for Office of Innovative Delivery DB and P3 (Non-MMIP)**
 - 5 Year IDIQ contract with a maximum contact value of \$100M
 - Primary Scope:
 - Project Studies & Analyses for the DB Program
 - Pre-Scoping & Early Schematics for the DB Program
 - Scoping & Costing Plans for DB Projects
 - Environmental Studies and Documents for DB Projects
 - Provide Cost Estimating Services
 - Provide CPM schedules for Pre-Let and Post-Let utilizing Primavera.
 - As Needed Scope:
 - Procurement Support for the DB Program
 - Post-Let Design Oversight – Submittal Review
 - Post-Let Construction Engineering Inspections



Anticipated Area Classes for the Prime and Key Team Leads

Area Classes:

3.05 Multi-lane Urban Interstate Limited Access Design

4.01 (a or b) Minor Bridge Design

8.01 Construction Engineering and Supervision

Key Team Leads:

A. Engineering Lead

B. Roadway Design Lead

C. Bridge Design Lead

D. National Environmental Policy Act (NEPA) Lead

E. Estimating Lead

F. ROW Lead

G. Utilities Lead

H. Tolling Lead

I. Construction Lead

Anticipated Area Classes for the Sub-Consultants

1.01	Statewide Systems Planning	1.11	Traffic and Toll Revenue Studies	3.15	Highway and Outdoor Lighting
1.02	Urban Area and Regional Transportation Planning	1.12	Major Investment Studies	3.17	Toll Facilities Infrastructure Design
1.04	Mass and Rapid Transportation Planning	2.01	Mass Transit Program (Systems) Management	4.02	Major Bridge Design
1.05	Alternate Systems Planning	2.02	Mass Transit Feasibility and Technical Studies	4.04	Hydraulic and Hydrological Studies (Bridges)
1.06(a)	NEPA	3.01	Two-Lane or Multi-Lane Rural Roadway Design	5.01	Land Survey
1.06(b)	History	3.02	Two-Lane or Multi-Lane urban Roadway Design	5.02	Engineering Survey
1.06(c)	Air Quality	3.03	Multi-Lane Urban Roadway Widening and Reconstruction	5.08	Overhead-Subsurface Utility Engineering SUE
1.06(d)	Noise	3.04	Multi-lane Rural Interstate Limited Access Design	6.01a	Soil Survey Studies
1.06(e)	Ecology	3.06	Traffic Operations Studies	6.01b	Geological and Geophysical Studies
1.06(f)	Archaeology	3.07	Traffic Operations Design	6.02	Bridge Foundation Studies
1.06(g)	Freshwater Aquatic Surveys	3.08	Landscape Architecture Design	6.03	Hydraulic and Hydrologic Studies (Soils and Foundation)
1.07	Attitude, Opinion, and Community Value Studies (Public Involvement)	3.09	Traffic Control Systems Analysis, Design and Implementation	9.01	Erosion, Sedimentation, and Pollution Control Plan
1.09	Location Studies	3.10	Utility Coordination	9.02	Rainfall and Runoff Reporting
1.10	Traffic Analysis	3.12	Hydraulic and Hydrological Studies (Roadway)		



Tentative Schedule for Engineering Services for Office of Innovative Delivery DB and P3

a. GDOT issues Public Notice Advertisement (PNA)	11/16/2016	-----
b. Industry Forum – GDOT Room 401/402/403/404	12/15/2016	10:00 AM
c. Industry one-on-one meetings – GDOT Room 407	12/15/2016 & 12/16/2016	12:00 PM – 4:30 PM & 9:00 AM – 4:30 PM
d. GDOT issues Request for Qualifications (RFQ)	12/30/2016	-----
e. Deadline for the submission of written questions and Requests for Clarification	01/20/2017	-----
f. Deadline for Statement of Qualifications (SOQ)	02/10/2017	2:00 PM



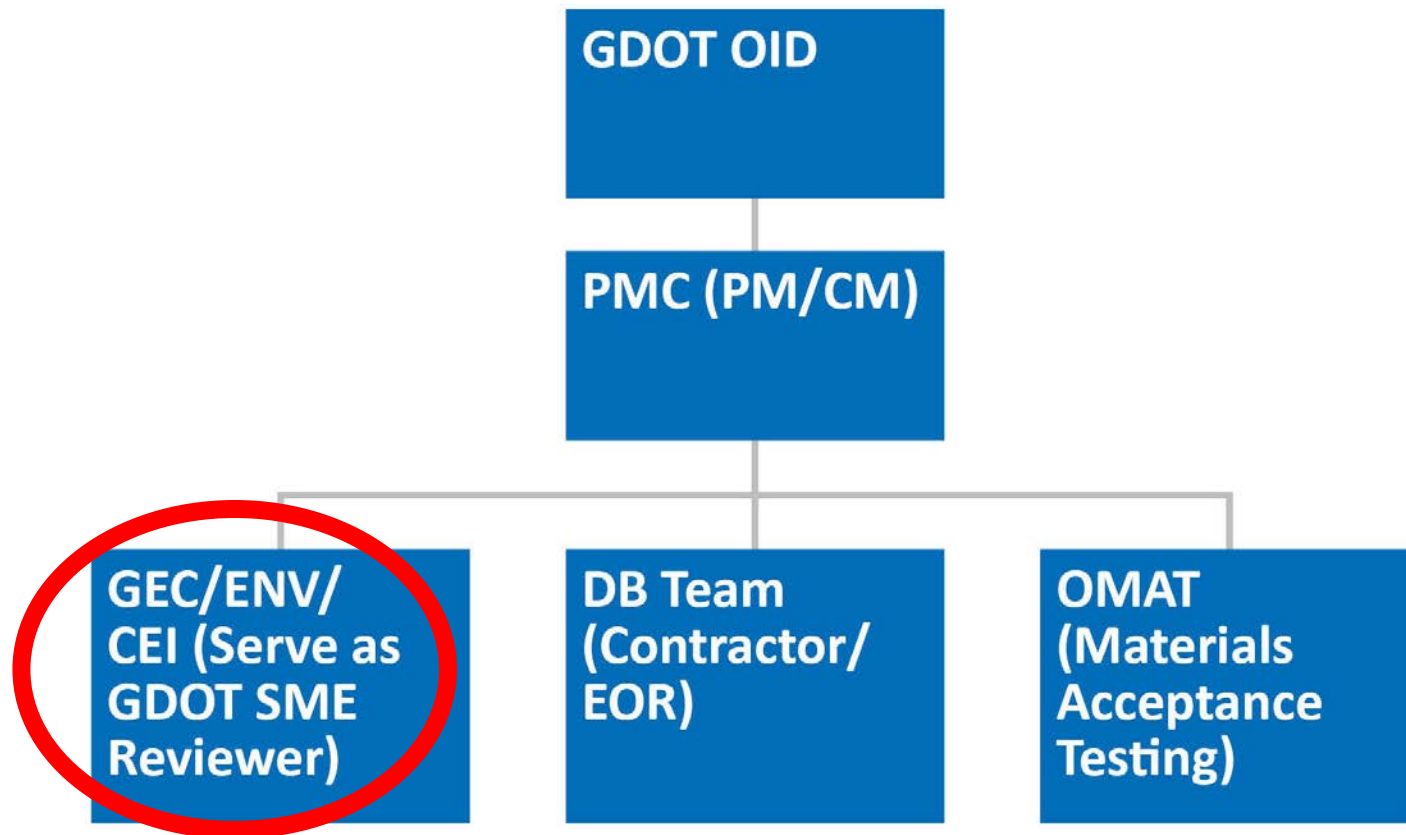
I-85 Widening Hamilton Rd to SR 211 GEC PI 110610

Tim Matthews, PE

Senior DB Project Manager



Organizational Chart for I-85 Widening (MMIP)





Opportunity Overview

- **I-85 Corridor GEC (Post-Let Delivery)**
 - Multi-Phase, Project Specific Contract via Firm Fixed Price and/or Cost Plus Fixed Fee methodology.
 - Scope:
 - Procurement Support (optional)
 - Post-Let Environmental Re-Evaluation
 - Post-Let Design Oversight – Submittal Review (No GDOT Reviews Anticipated)
 - Cost Estimating Services
 - CPM schedules for Post-Let phase utilizing Primavera.
 - Construction Oversight – CEI (No District CM Anticipated)



Anticipated Area Classes for the Prime and Key Team Leads

Area Classes:

- 3.05 Multi-lane Urban Interstate Limited Access Design
- 4.01 (a or b) Minor Bridge Design
- 8.01 Construction Engineering and Supervision

Key Team Leads:

- A. Engineering Lead
- B. Roadway Design Lead
- C. Bridge Design Lead
- D. National Environmental Policy Act (NEPA) Lead
- E. Estimating Lead
- F. Utilities Lead
- G. Construction Lead



Anticipated Area Classes for the Sub-Consultants

1.01 Statewide Systems Planning	1.07 Attitude, Opinion, and Community Value Studies (Public Involvement)	3.06 Traffic Operations Studies
1.02 Urban Area and Regional Transportation Planning	1.09 Location Studies	3.07 Traffic Operations Design
1.04 Mass and Rapid Transportation Planning	1.10 Traffic Analysis	3.08 Landscape Architecture Design
1.05 Alternate Systems Planning	1.11 Traffic and Toll Revenue Studies	3.09 Traffic Control Systems Analysis, Design and Implementation
1.06(a) NEPA	1.12 Major Investment Studies	3.10 Utility Coordination
1.06(b) History	2.01 Mass Transit Program (Systems) Management	3.12 Hydraulic and Hydrological Studies (Roadway)
1.06(c) Air Quality	2.02 Mass Transit Feasibility and Technical Studies	3.17 Toll Facilities Infrastructure Design
1.06(d) Noise	3.01 Two-Lane or Multi-Lane Rural Roadway Design	4.04 Hydraulic and Hydrological Studies (Bridges)
1.06(e) Ecology	3.02 Two-Lane or Multi-Lane urban Roadway Design	9.01 Erosion, Sedimentation, and Pollution Control Plan
1.06(f) Archaeology	3.03 Multi-Lane Urban Roadway Widening and Reconstruction	9.02 Rainfall and Runoff Reporting
1.06(g) Freshwater Aquatic Surveys	3.04 Multi-lane Rural Interstate Limited Access Design	



Tentative Schedule for I-85 Widening Hamilton Rd to SR 211 GEC

a. GDOT issues Public Notice Advertisement (PNA)	11/16/2016	-----
b. Industry Forum – GDOT Room 401/402/403/404	12/15/2016	10:00 AM
c. Industry one-on-one meetings – GDOT Room 407	12/15/2016 & 12/16/2016	12:00 PM – 4:30 PM & 9:00 AM – 4:30 PM
d. GDOT issues Request for Qualifications (RFQ)	12/30/2016	-----
e. Deadline for the submission of written questions and Requests for Clarification	01/20/2017	-----
f. Deadline for Statement of Qualifications (SOQ)	02/09/2017	2:00 PM

Selection of the I-85 Corridor GEC will be made public before the DB RFQ is advertised.



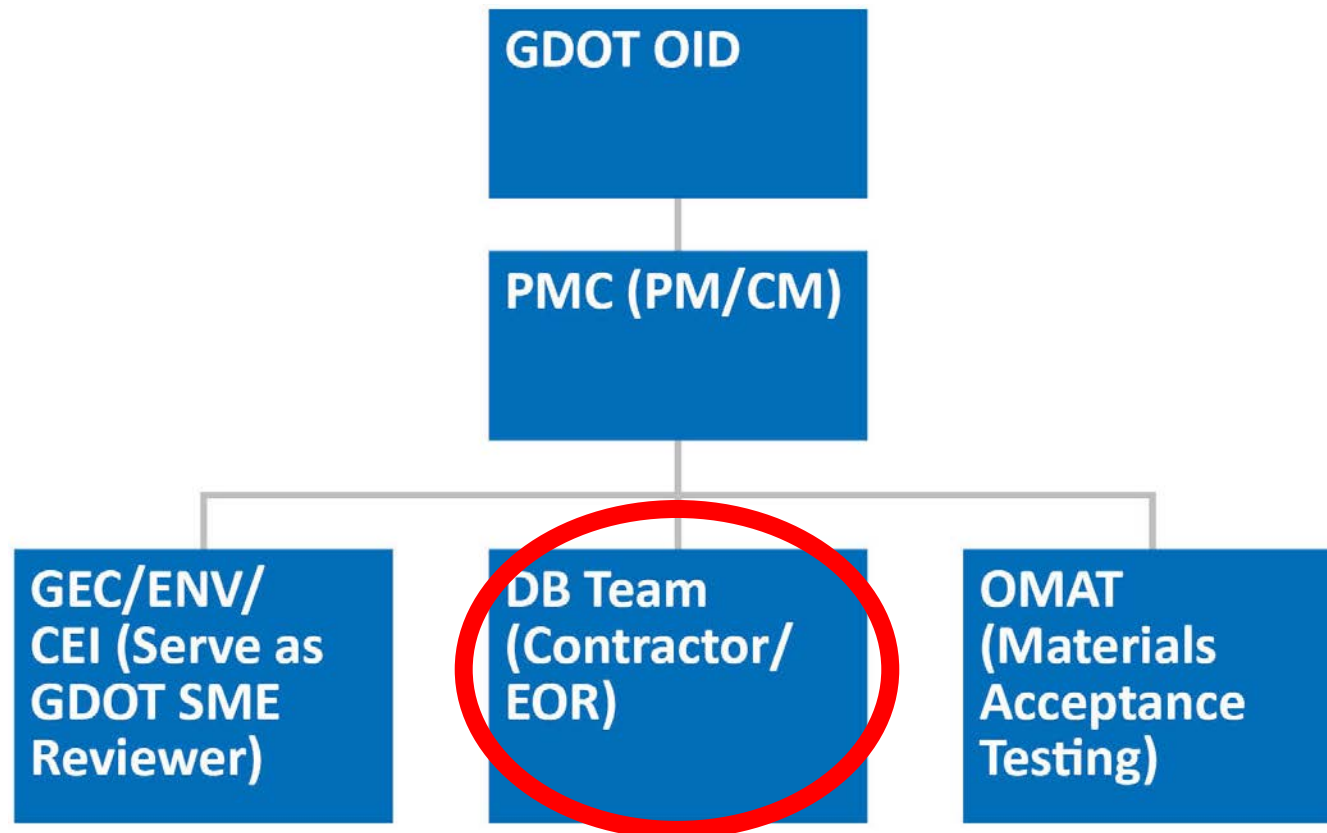
I-85 Widening Hamilton Rd to SR 211 DB Contract PI 110610

Tim Matthews, PE

Senior DB Project Manager

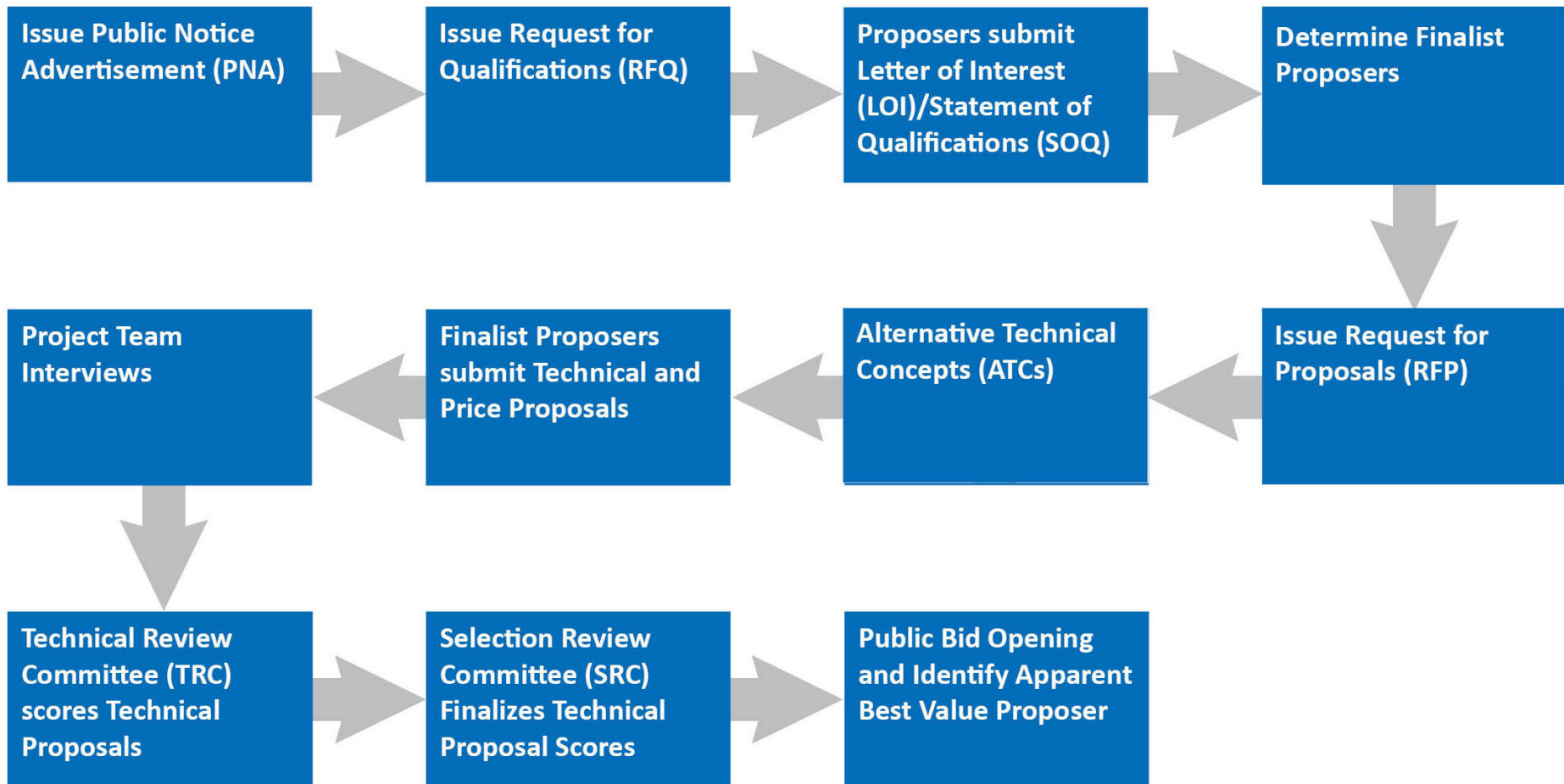


Organizational Chart for I-85 Widening





Anticipated Best Value Procurement Process





Tentative Schedule of Events

a. GDOT issues Public Notice Advertisement	11/16/2016	-----
b. Industry Forum (to be held at GDOT in Room 401/402/403/404)	12/15/2016	10:00 AM
c. GDOT issues Request for Qualifications (RFQ)	03/24/2017	-----
d. Deadline for submission of written questions and Requests for Clarification	04/19/2017	2:00 PM
e. Deadline for submission of Letter of Interest (LOI)/Statement of Qualifications (SOQ)	04/28/2017	2:00 PM
f. GDOT issues the Notice to Finalists	05/12/2017	-----
g. GDOT issues the Request for Proposals (RFP) to the Finalists	05/26/2017	-----
h. Deadline for receipt of price and technical proposals	08/18/2017	2:00 PM
i. GDOT letting (publicly open scope and price proposals)	09/15/2017	-----



Roles and Responsibilities

- **Design-Build Team**
 - Schedule development/management
 - Roadway and Bridge design
 - Geotechnical reports
 - Stream buffer variance application (if needed)
 - Install & maintain detour signage
 - Utility/coordination and relocation (if needed)
 - Replace each bridge within allowable detour duration
 - Permit and mitigation costs
 - Construction



Anticipated RFQ Evaluation Criteria

- **Must demonstrate required Consultant Area Classes**
- **Relevant project experience, qualifications, and availability of the:**
 - Lead Design Consultant Firm
 - Lead Design Consultant Project Manager
 - Lead Contracting Firm
 - Lead Contractor Project Manager
 - Select Key Team Leaders
- **Suitability to provide services for project**
- **Past performance**
- **Finalists 3-5 highest qualified teams**



Anticipated RFP Best Value Selection Criteria

- **Technical Proposal - 25%**

- Technical Score is based on a 250 maximum total points.
- Evaluation Criteria may include:
 - Construction Phasing
 - Schedule/Duration
 - Construction Staging and Traffic Control Plan
 - Project Management and Approach
 - DBE Approach (TBD)

- **Price/Variable Scope Proposal - 75%**

- The Price Proposal Score is based on a 750 maximum total points.

$$= a * \left(\frac{\text{Scope of Respective Proposer}}{\text{Most Aggressive Scope}} \right) + b * \left(\frac{\text{Low Bid}}{\text{Bid of Respective Proposer}} \right)$$



Technical Proposal

Anticipated Evaluation Sections (RFP)

- **Construction Phasing (100 points)**
 - Early opening of roadway segments
- **Project Schedule/Duration (75 points)**
 - DB Team must provide acceptable schedule
- **Traffic Management Plan (30 points)**
 - Less impacts to traveling public
 - Detour and Coordination planning
- **Project Management Approach and Plan (30 points)**
 - Interview
 - Technical Approach
- **DBE Approach (15 points)**
 - Achieve DBE goal on the project (pass/fail)
 - Achieving DBE goal throughout life of the project
 - Utilizing DBEs in a variety of ways



Price/Variable Scope Proposal (RFP)

$$= a * \left(\frac{\text{Scope of Respective Proposer}}{\text{Most Aggressive Scope}} \right) + b * \left(\frac{\text{Low Bid}}{\text{Bid of Respective Proposer}} \right)$$

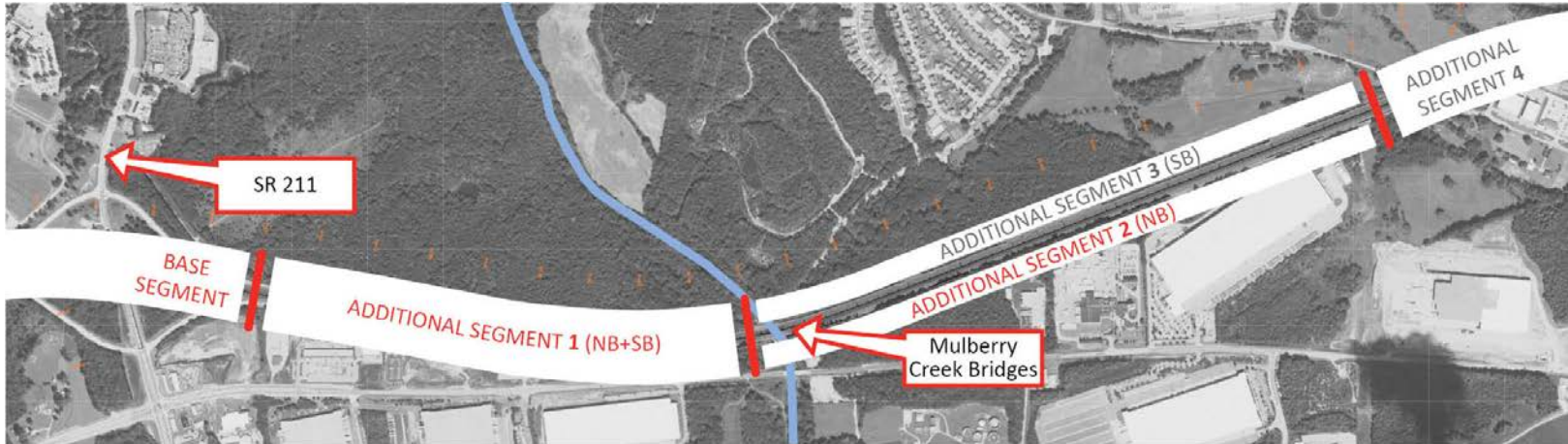
- **Percent Relationship between Price and Scope**

- Percentages and Maximum Available Price still under development
- Priority leaning towards scope over price

- **110610 will be defined as the base scope**

- **Additional scope will be approximately 1 mile segments**

- Scope for each segment will be defined in the RFP



$$\text{Total Points} = a \left(\frac{\text{Scope of Prospective Proposer}}{\text{Most Aggressive Scope}} \right) + b \left(\frac{\text{Low Bid}}{\text{Bid of Respective Proposer}} \right)$$

Example Proposer #1

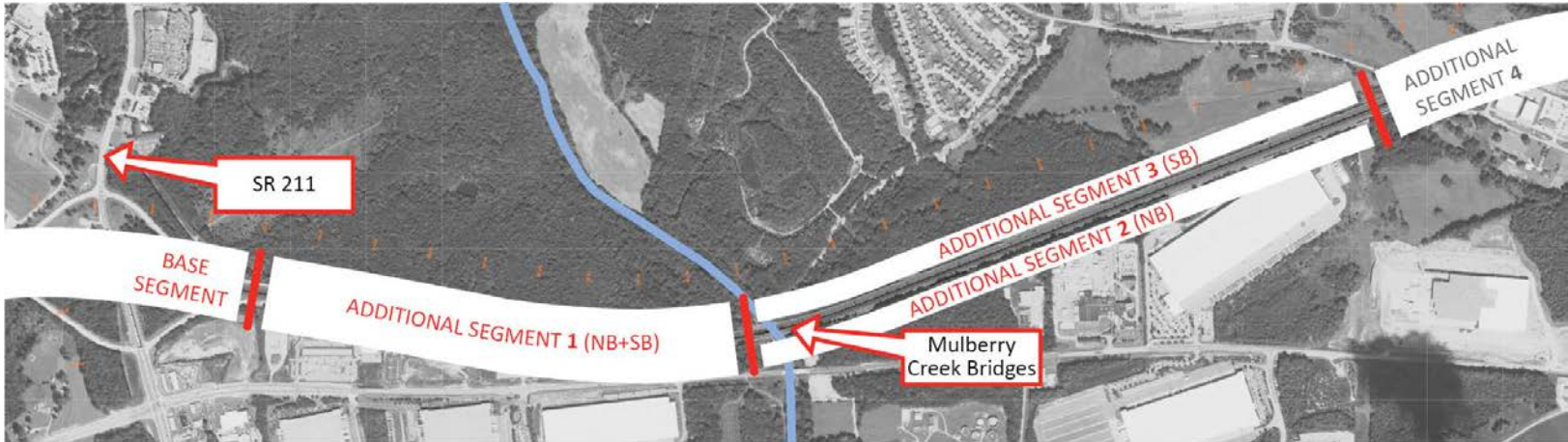
Base = 10 Segments

$$= 500 \left(\frac{12 \text{ Segments}}{13 \text{ Segments}} \right) + 250 \left(\frac{\$9.00}{\$9.00} \right)$$

$$= 500 (.923) + 250 (1)$$

$$= 461.5 + 250$$

Total Points = **711.5**



$$\text{Total Points} = a \left(\frac{\text{Scope of Prospective Proposer}}{\text{Most Aggressive Scope}} \right) + b \left(\frac{\text{Low Bid}}{\text{Bid of Respective Proposer}} \right)$$

Example Proposer #2

Base = 10 Segments

$$= 500 \left(\frac{13 \text{ Segments}}{13 \text{ Segments}} \right) + 250 \left(\frac{\$9.00}{\$10.00} \right)$$

$$= 500 (1) + 250 (.9)$$

$$= 500 + 225$$

Total Points = **725**



Anticipated Stipulated Fee

- \$240,000 approved stipulated fee for PI 110610
- 0.2% of the anticipated Design-Build Contract Value per Table 1.2 of the Design-Build Manual below:

•Table 1.2 Stipulated Fee Amount

Design-Build Estimated Contract Value	Best Value	Two Phase Low Bid (w/ Shortlist)	Two Phase Low Bid (all qualified)	One Phase Low Bid
>\$50M	0.2 % Minimum 0.2 % Recommended	0.1 % Minimum 0.2 % Recommended	0.0 % Minimum 0.1 % Recommended	No Stipulated Fee
<\$50M	0.2 % Minimum 0.4 % Recommended	0.1 % Minimum 0.2 % Recommended	0.0 % Minimum 0.1 % Recommended	No Stipulated Fee



Stipulated Fee Requirements

In exchange for a Stipulated Fee, Proposers must turn over to the Department all project related information collected and prepared during the preparation of the price and technical proposal. This may include, but is not limited to:

- Approved Alternative Technical Concepts (ATC)
- Revised plan layouts
- Geo-technical data
- CAD files
- Detailed project schedule
- Record of correspondence with agencies

This information will be provided to the awarded Design-Build Team. The Department will also have the ability to negotiate approved ATCs from unsuccessful Proposers into the awarded Design-Build Team's contract to obtain additional value or cost savings for the Department.



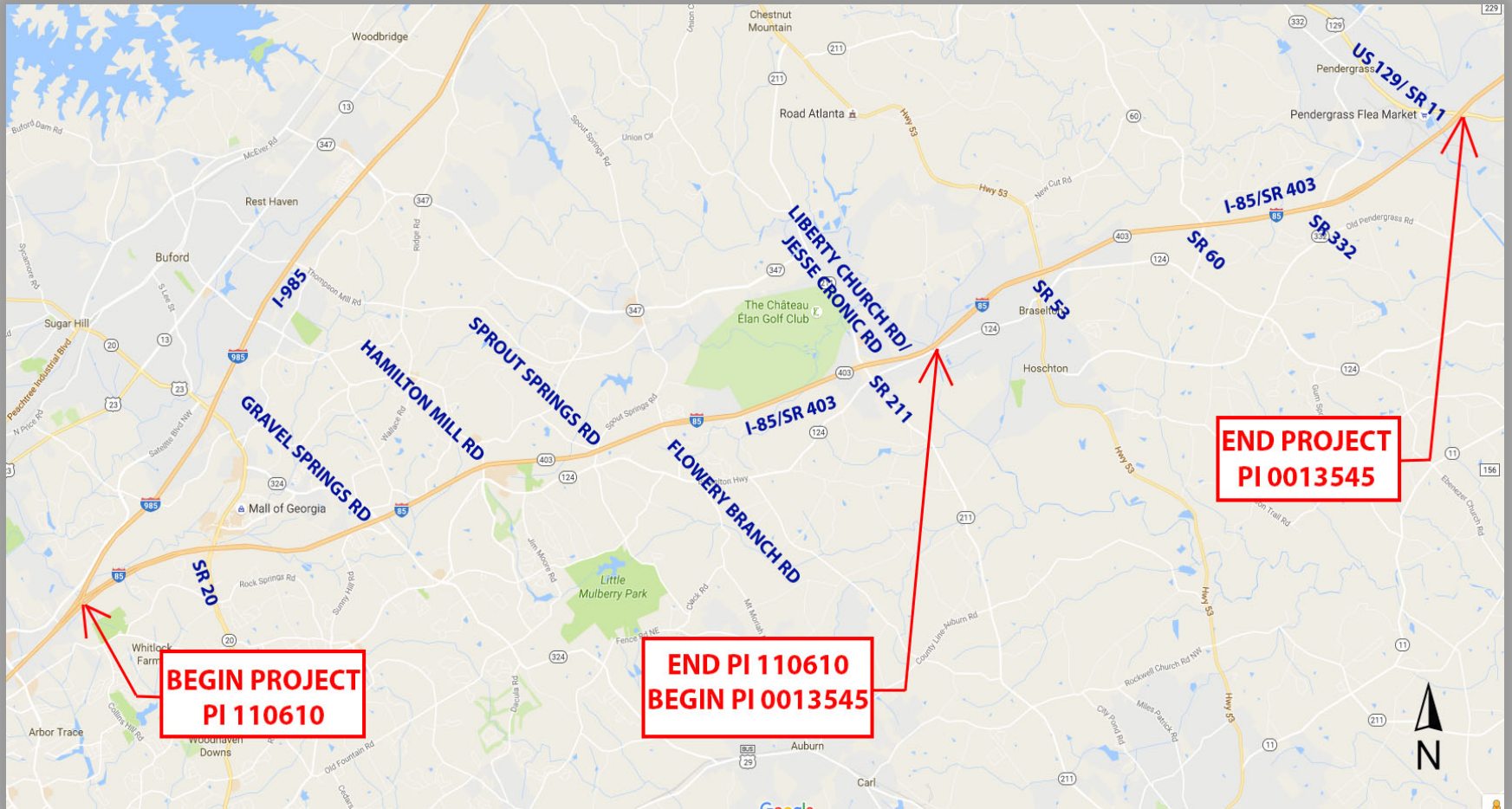
I-85 Widening Hamilton Rd to SR 211 Project Specifics

Tim Matthews, PE

Senior DB Project Manager



Project Location





Anticipated Project Scope

- **Widen I-85 to the inside north of I-985**
 - Expanding from two lanes to three lanes in SB and NB
 - Median barrier and 9-ft to 12-ft inside shoulders for section between Hamilton Mill Rd/CR 134 and SR 211
 - *14-foot striped buffer between GP and ML from north of I-985 to just south of Hamilton Mill Rd/CR 134 converted to a GP in both directions*
- **Replace I-85 Mainline Bridges**
- **Replace 2 Overpass Bridges**
 - Replacement must fit within existing right of way
 - No interchange work
- **Contract Duration (Design & Construction)**
 - Groundbreaking anticipated Spring of 2018
 - 110610 completion date based on a 4 year multi-year contract with SRTA



Anticipated Project Scope

- **Stay within existing right of way**
- **Replacement of all guardrails within the corridor**
- **Design Exceptions (any current deficiencies must be addressed)**
 - The project does not propose any design exceptions.
 - The project costing plan proposes to correct several existing substandard vertical curves to eliminate the need for design exceptions.
- **Design Variances (any current deficiencies must be addressed)**
 - The project proposes design variances at multiple locations on the existing alignment for:
 - Broken Back Horizontal Curve
 - Curve Length



Offsite traffic detours for overpass bridge replacements Detours

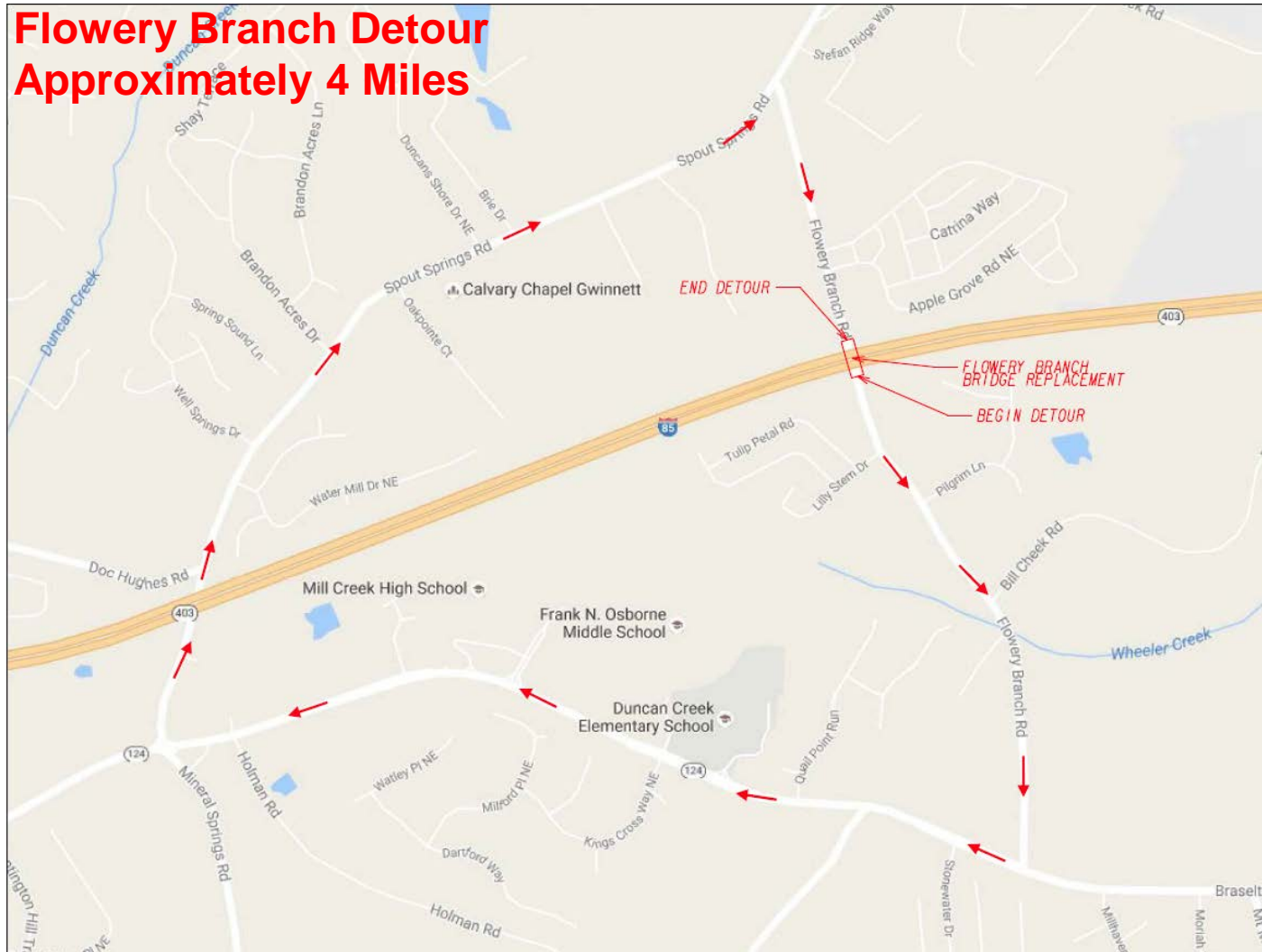
**Sprout Springs Detour
Approximately 4 Miles**





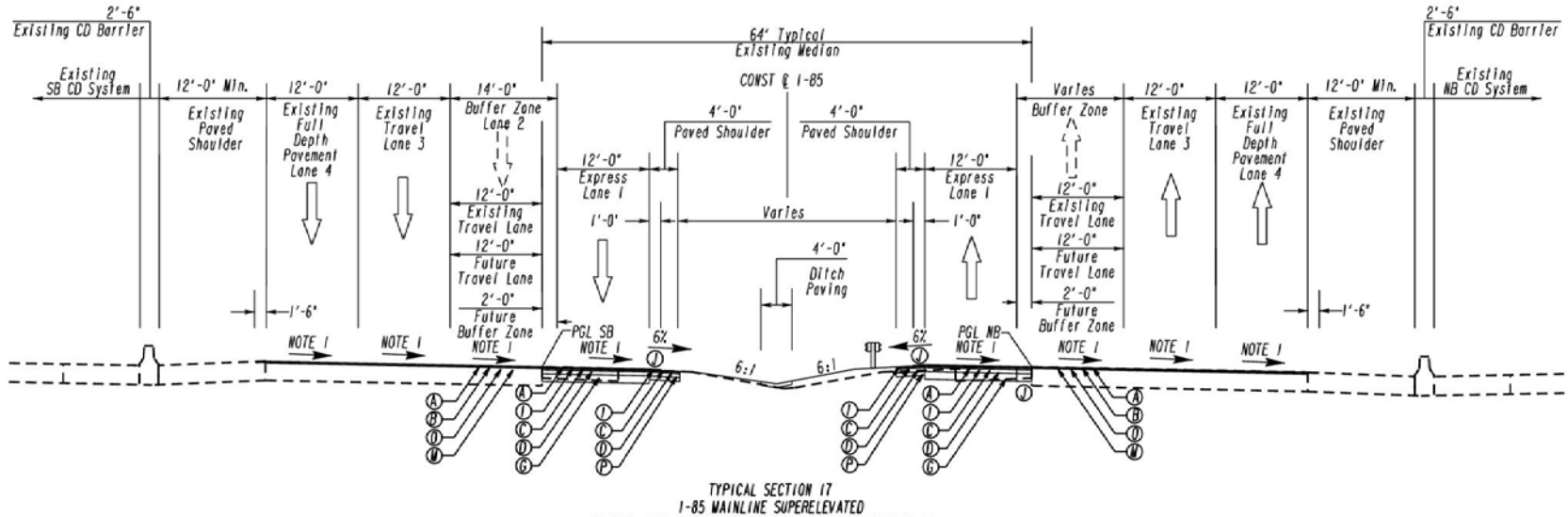
Offsite traffic detours for overpass bridge replacements Detours

**Flowery Branch Detour
Approximately 4 Miles**

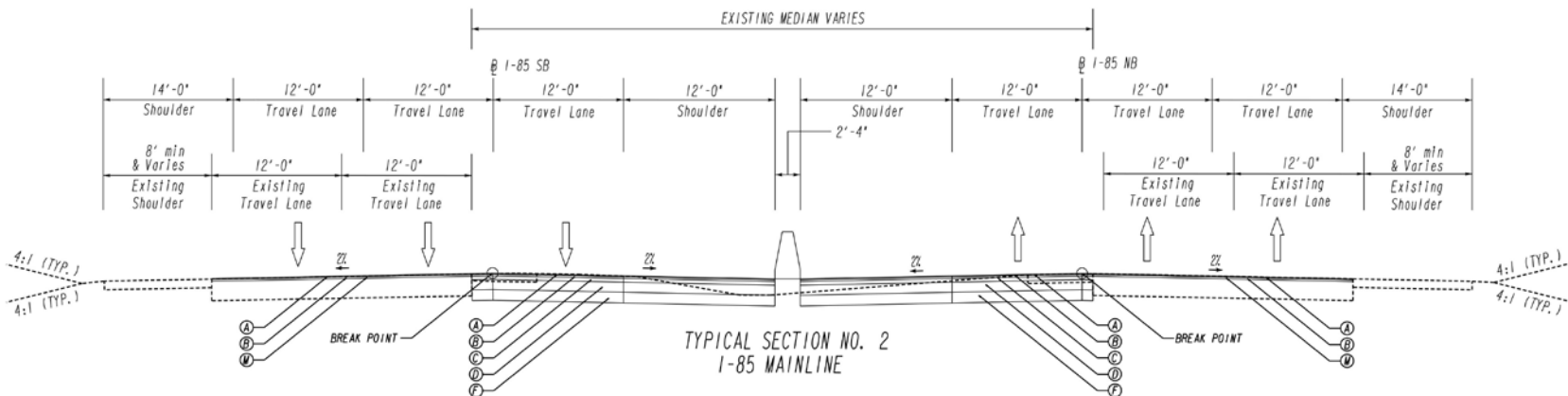




110600 and 110610 Typical Section



South of Hamilton Mill Road



North of Hamilton Mill Road

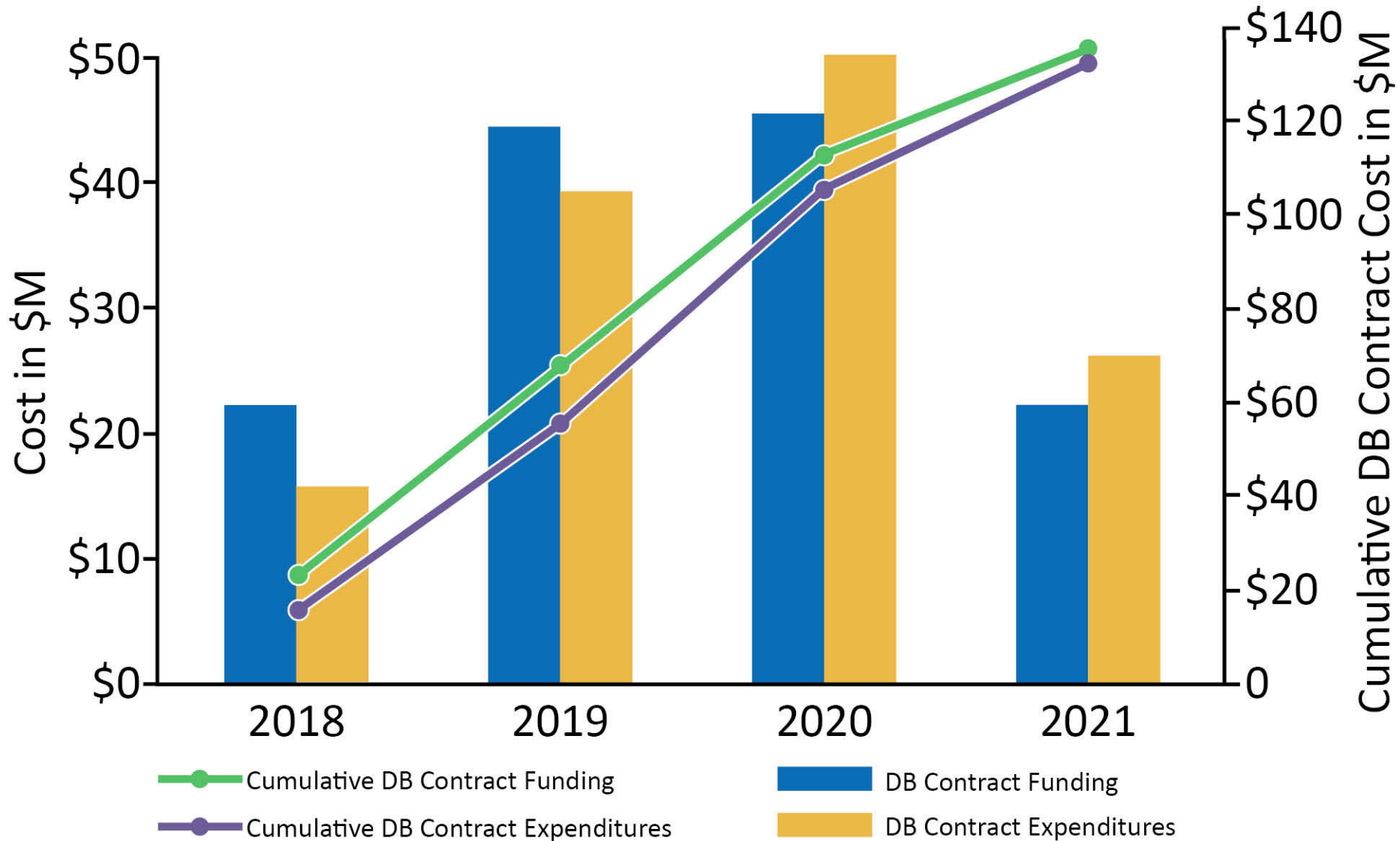


Multi Year DB Contracting

- Multi Year DB Contract will be administered through SRTA
- The DB Contract will specify the available funds per Fiscal Year in the RFP so the DB Team can accurately develop their schedule
- The DB Contract will instruct the DB Teams that they are **NOT** to encumber debt under this contracting method
- The DB Team will be required to sign an acknowledgment of understanding for this method of contract with the Technical Proposal submittal
- The DB Team's schedule shall always track below the available cumulative funds for the project.



Multi Year DB Contracting





Questions?

GDOT Design-Build Webpage

<http://www.dot.ga.gov/PS/Innovative/DesignBuild>

GDOT Design-Build SharePoint Site

<http://mydocs.dot.ga.gov/info/designbuild/default.aspx>