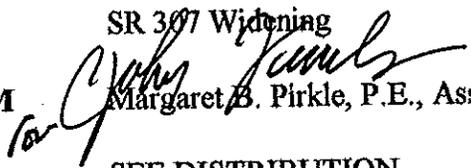


D.O.T. 66

DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA

INTERDEPARTMENT CORRESPONDENCE

FILE MLP-307(8) Chatham County **OFFICE** Preconstruction
P. I. No. 562165
SR 307 Widening **DATE** July 13, 2004

FROM  Margaret B. Pirkle, P.E., Assistant Director of Preconstruction

TO SEE DISTRIBUTION

SUBJECT NOTICE OF LOCATION AND DESIGN APPROVAL

Attached for your further handling is the approved Location and Design Report on the above subject project.

Also attached is the Notice of Location and Design Approval. This is authorization for the District to proceed with advertisement.

MBP/cj

Attachment

DISTRIBUTION:

David Mulling
Harvey Keepler
Jamie Simpson
Paul Liles
Phillip Allen
Jerry Hobbs
Joe Palladi (file copy)
Brent Story
Ben Buchan
Gary Priester
BOARD MEMBER

Consistency with Approved Planning:

The design description as presented herein and submitted for approval is consistent with the approved Concept Report, subject to the update stated above.

Recommendations:

The Office of Urban Design recommends that the location and design for the project be approved and that the attached Notice be approved for advertising.

RECOMMEND: Thomas L. Quinn
Director of Preconstruction

APPROVE: Paul W. Walsh
Chief Engineer

7/2/04
Date of Approval

JBB:DVM:vcv

Attachments: Sketch Map, Cost Estimate, and Notice of L&D Approval.

PRELIMINARY COST ESTIMATE
URBAN DESIGN OFFICE

DATE: 06/11/04 PREPARED BY: VCP
PROJECT NO: MLP-307(8) FILE NAME: Costestimate61004.xls
P.I. NO: 562165 LENGTH: 1.23 miles

PROJECT DESCRIPTION/CONCEPT: SR 307/DEAN FOREST ROAD WIDENING AND
RECONSTRUCTION FROM 800' WEST OF RB MILLER ROAD
TO 1055' EAST OF SR 21
EXISTING ROADWAY, SR 307/DEAN FOREST ROAD

TRAFFIC: CURRENT AADT PROJECTED AADT
18,900 (2005) 27,600 (2025)

- () PROGRAMMING PROCESS
() CONCEPT DEVELOPMENT
(X) DURING PROJECT DEVELOPMENT

PROJECT COSTS

A. RIGHT OF WAY	lump sum		\$1,356,800.00
		SUBTOTAL	\$1,356,800.00
B. REIMBURSABLE UTILITIES			
Warning Lights	6 ea @	\$50,000.00	\$300,000.00
		SUBTOTAL	\$300,000.00
C. CLEARING AND GRUBBING	10 acres @	\$23,000.00	\$230,000.00
		SUBTOTAL	\$230,000.00
D. EARTHWORK			
<u>Geotechnical</u>			
Geogrid	24,000 yd ² @	\$5.00	\$120,000.00
Granular Embankment	23,000 yd ³ @	\$17.00	\$391,000.00
<u>In Place Embankment</u>			
Borrow Incl Haul	11,800 yd ³ @	\$15.00	\$177,000.00
		SUBTOTAL	\$688,000.00
E. BASE AND PAVING			
GAB	9000 TON @	\$30.00	\$270,000.00

Asphalt Paving

Asph Conc 12.5 mm Superpave	3200 TON @	\$40.00	\$128,000.00
Asph Conc 19 mm Superpave	1500 TON @	\$40.00	\$60,000.00
Asph Conc 25 mm Superpave	3000 TON @	\$40.00	\$120,000.00
Leveling	5500 TON @	\$34.00	\$187,000.00
Tack Coat	2200 GAL @	\$1.00	\$2,200.00
Mill Asph Conc Pvmt, 3.5" Depth	38000 yd ² @	\$2.00	\$76,000.00
Mill Asph Conc Pvmt, 1.5" Depth	1650 yd ² @	\$1.50	\$2,475.00
		SUBTOTAL	\$845,675.00

F. DRAINAGE

Type II Embankment	36 yd ³ @	\$45.00	\$1,620.00
Double 7' x 4' Box Culvert	1 lump sum	\$180,000.00	\$180,000.00
Storm Drainage Pipe 18" H 0-10 ft	2840 linear foot @	\$26.00	\$73,840.00
Storm Drainage Pipe 24" H 0-10 ft	15 linear foot @	\$33.00	\$495.00
Storm Drainage Pipe 48" H 0-10 ft	145 linear foot @	\$70.00	\$10,150.00
Flared End Section 18 in (FES)	25 each @	\$380.00	\$9,500.00
Flared End Section 24 in (FES)	1 each @	\$386.00	\$386.00
Concrete Headwall	7 yd ³ @	\$550.00	\$3,850.00
Catch Basin	50 each @	\$1,900.00	\$95,000.00
		SUBTOTAL	\$374,841.00

G. CONCRETE WORK

Raised Median	2650 yd ² @	\$35.00	\$92,750.00
Curb and Gutter	13000 linear foot @	\$16.00	\$208,000.00
Concrete Sidewalk, 4" thk	7148 yd ² @	\$20.00	\$142,960.00
Concrete Valley Gutter, 8"	135 yd ² @	\$28.00	\$3,780.00
		SUBTOTAL	\$447,490.00

H. TRAFFIC CONTROL

1 lump sum	\$125,000.00	\$125,000.00
	SUBTOTAL	\$125,000.00

I. EROSION CONTROL

Temporary Silt Fence, Tp C	9,510 linear foot@	\$4.00	\$38,040.00
Const & Remove Silt Control Gate Tp 3	2 each	\$405.00	\$810.00
Stn Dumped Rip Rap Tp 1, 24 IN	370 yd ² @	\$69.00	\$25,530.00
Filter Fabric	370 yd ² @	\$4.00	\$1,480.00
Const & Remove Baled Straw Erosion Chec	3,300 linear foot@	\$2.50	\$8,250.00
Maintenance of Temporary Silt Fence Tp C	4,755 linear foot@	\$1.50	\$7,132.50
Maintenance of Silt Control Gate Tp 3	2 each	\$176.00	\$352.00
Maintenance of of Baled Straw Erosion Che	1,650 linear foot@	\$1.50	\$2,475.00
		SUBTOTAL	\$84,069.50

J. SIGNS, STRIPING, SIGNALS, LIGHTING

Striping	1 lump sum		\$25,000.00
Roadside Signs	1 lump sum		\$5,000.00
Highway signs, Tp2 Matl, Refl Sheeting Tpt	30 ft ² @	\$30.00	\$900.00
Strain Pole, Tp IV	12 each	\$4,070.00	\$48,840.00
Traffic Signal Installation No. 1	1 lump sum	\$49,000.00	\$49,000.00
Traffic Signal Installation No. 2	1 lump sum	\$55,000.00	\$55,000.00
Traffic Signal Installation No. 3	1 lump sum	\$61,000.00	\$61,000.00
Pull-Box, PB-4	5 each	\$1,575.00	\$7,875.00
Pull-Box, PB-5	5 each	\$2,060.00	\$10,300.00
Traffic Signal Timing-(Project Number)	1 lump sum	\$2,500.00	\$2,500.00
Out Side Fiber Optic Cable, Loose Tube, Single Mode, 24 fiber	5000 linear foot	\$5.00	\$25,000.00
Outside Plant Fiber Optic Cable, Drop, Mode, 6 Fiber	500 linear foot	\$2.00	\$1,000.00
Fiber Optic Closure, Underground, 24 fiber	5 each	\$800.00	\$4,000.00
Fiber Optic Splice, fusion	10 each	\$45.00	\$450.00
Fiber Optic Patch Cord, SM	10 each	\$95.00	\$950.00
Fiber Optic Snowshoe	5 each	\$105.00	\$525.00
External Transceiver, Drop and repeat, 1310 Single Mode, (Single Jobs)	5 each	\$1,450.00	\$7,250.00
Testing	1 lump sum	\$6,250.00	\$6,250.00
Testing	1 lump sum	\$1,270.00	\$1,270.00

SUBTOTAL \$312,110.00

K. GRASSING/LANDSCAPING

lump sum \$28,000.00

SUBTOTAL \$28,000.00

L. MISCELLANEOUS

Field Engineer Office	1 each @	\$60,000.00	\$60,000.00
Right-of-Way Markers	28 each @	\$69.00	\$1,932.00

SUBTOTAL \$61,932.00

ESTIMATE SUMMARY

A. Right of Way	\$1,356,800.00
B. Reimbursable Utilities	\$300,000.00

CONSTRUCTION COST SUMMARY

C. Clearing and Grubbing	\$230,000.00
D. Earthwork	\$688,000.00
E. Base and Paving	\$845,675.00
F. Drainage	\$374,841.00
G. Concrete Work	\$447,490.00
H. Traffic Control	\$125,000.00
I. Erosion Control	\$84,069.50
J. Signs, Striping, Signals, Lighting	\$312,110.00
K. Grassing/Landscaping	\$28,000.00
L. Miscellaneous	\$61,932.00

SUBTOTAL CONSTRUCTION \$3,197,118

SUBTOTAL \$3,197,118

10 % E & C	\$319,712
Year of	
1 Inflation at 5 %	\$175,841.46

TOTAL CONSTRUCTION ESTIMATE \$3,692,671

TOTAL PROJECT COST ESTIMATE \$5,349,471

NOTICE OF LOCATION AND DESIGN APPROVAL

**MLP-307(8), Chatham County
P.I. No. 562165**

Dean Forest Road from Robert B. Miller Road to east of SR 21

Notice is hereby given in compliance with Georgia Code 22-2-109 that the Georgia Department of Transportation has approved the Location and Design of the above referenced project.

The date of location approval is July 13, 2004.

This project consists of widening an existing 4 lane undivided facility. The project is located near the Savannah Airport in the Cities of Savannah and Garden City within Chatham County. The total project length is approximately 1.23 miles.

The project proposes to widen S.R. 307 from Robert Miller Road to approximately 1054 feet east of SR 21. The proposed typical section consists of 4-13 foot lanes (with 12 foot turning lanes and a 16 foot flush median) before Commerce/Export Blvd and 4-12 foot lanes with a 20 foot raised median that will end approximately 820 feet east of SR 21. The shoulders will vary from 12 feet to 18 feet and will include curb and gutter and 5 foot wide sidewalks. New traffic signals are proposed for the intersections of SR 307 at Robert Miller Road and SR 307 at Commerce/Export Boulevards. The traffic signal at SR 307 and SR 21 will be upgraded to accommodate the new design.

Drawings, maps, or plats of the proposed project, as approved, are on file and are available for inspection at the Georgia Department of Transportation:

Slade Cole
Assistant Area Engineer
Slade.Cole@dot.state.ga.us
P.O. Box 1212
Savannah, GA 31402
(912) 651-2144

Any interested party may obtain a copy of the drawings or maps or plats or portions thereof by paying a nominal fee and requesting in writing to:

James B. Buchan, P.E.
Office of Urban Design
Ben.Buchan@dot.state.ga.us
#2 Capitol Square, SW
Atlanta, GA 30334-1002
(404) 656-5436

Any written request or communication in reference to this project or notice SHOULD include the Project and P. I. Numbers as noted at the top of this Notice.

C. Arterials

1. All arterials with design speeds or posted speeds ≤ 45 mph and base year traffic volumes $\leq 18,000$ and design year traffic volumes $\leq 24,000$ will require a five lane section (flush median).
2. All arterials with design speeds or posted speeds ≤ 45 mph and base year traffic volumes $\leq 18,000$ and design year traffic volumes $\geq 24,000$ will require a five lane section (flush median). The project will be designed to incorporate a future 20-foot raised median or preferably a 24-foot raised median depending on impacts. Right-of-way will be purchased for footprint determined by raised 20/24-foot median typical section. Monitoring of accidents and traffic volumes on a five year cycle by the Safety Engineer in the Office of Traffic Operations will determine the need and implementation of a raised median section.
3. All urban arterials with base year traffic volumes $\geq 18,000$ ADT and design year traffic volumes $\geq 24,000$ ADT and design speed \leq of 45 mph will have a 20-foot raised median or preferably a 24-foot raised median depending on impacts.
4. Raised medians will be constructed on multi-lane facilities at intersections that include one of the following:
 - a) High turning volumes relating to 18,000 ADT (base year) and 24,000 ADT (design year)
 - b) Accident rate greater than the state average for its classification
 - c) Excessive queue lengths (as determined by District Traffic Engineer) in conjunction with excessive number of driveways.
5. All arterials with posted speeds ≥ 55 mph or design speeds ≥ 50 mph will require the design of a 24-foot raised median, 44-foot depressed median or a positive barrier system depending upon functional classification, the type of development along the corridor, type of access management and right of way impacts.
6. All multi-lane facilities with three or more lanes in each direction shall include positive separation of opposing traffic using a median. Type of median shall depend on guidelines stated above.

D. GRIP Corridors

1. All GRIP corridors with design speeds ≤ 45 mph and base year traffic $\leq 18,000$ and design year traffic $\leq 24,000$ will require a five lane flush median.
2. All GRIP corridors with design speeds ≤ 45 mph and base year traffic $\geq 18,000$ or design year traffic $\geq 24,000$ will require a 20-foot raised median minimum or preferably a 24-foot raised median.
3. All GRIP corridors with design speeds ≥ 50 mph will be designed with a 44-foot depressed median.

