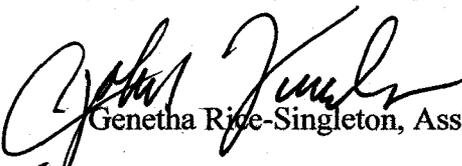


DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA

INTERDEPARTMENT CORRESPONDENCE

FILE P. I. Nos. 0006888 & 0006931 **OFFICE** Preconstruction
DeKalb-Rockdale Counties
CSSTP-0006-00(888)/ CSSTP-0006-00(931)
Hayden Quarry Road/ Sigman Road Extension **DATE** September 6, 2006

FROM  Genetha Rice-Singleton, Assistant Director of Preconstruction

TO  SEE DISTRIBUTION

SUBJECT APPROVED PROJECT CONCEPT REPORT

Attached for your files is the approval for subject project.

Attachment

DISTRIBUTION:

Brian Summers
Harvey Keeper
Ken Thompson
Michael Henry
Keith Golden
Joe Palladi
Paul Liles
Bryant Poole
BOARD MEMBER

**DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA**

INTERDEPARTMENT CORRESPONDENCE

FILE: P. I. Nos. 0006888/0006931, DeKalb-Rockdale Counties **OFFICE** Preconstruction
CSSTP-0006-00(888)/CSSTP-0006-00(931)
Hayden Quarry Road/Sigman Road Extension **DATE** August 30, 2006

FROM *John Hunt*
Genetha Rice-Singleton, Assistant Director of Preconstruction

TO *DR* David E. Studstill, Jr., P.E., Chief Engineer

SUBJECT PROJECT CONCEPT REPORT

These combined projects comprise the Hayden Quarry Road Extension. The proposed 1.8 mile connector roadway will connect Turner Hill Road in DeKalb County to Sigman Road in Rockdale County to provide additional access to I-20. The eastern edge of DeKalb County and western edge of Rockdale County along I-20 is experiencing major development in the area of the new Mall at Stonecrest. Based on the overall master plan for the mall area as well as additional proposed development information available for Rockdale County in the vicinity of the mall, approximately 1,969 residential units, 2.6 million square feet of retail/restaurant, 450 hotel rooms, and 860,000 square feet of office space, are expected in the Turner Hill Road area. It is estimated that these proposed developments will account for an additional 131,650 daily trips in the surrounding roadway network. The development in this area also includes two Developments of Regional Impact (DRI) that will increase travel demand in the area. With the additional traffic from the planned area developments, it is projected that existing infrastructure will not be able to provide adequate capacity to serve the expected demand. A review of the traffic projections in the ARC Travel Demand Model reveals that 26,750 daily vehicle trips are projected along an east-west connection between Sigman Road and Turner Hill Road.

The proposed construction will consist of two, 12' travel lanes in each direction separated by a 20' raised grass median. From beginning of project to Stonecrest Boulevard, the shoulders will be 16' with curb and gutter in each direction. They will consist of 5' sidewalks and a 6' planting strip. The remainder of the project along Hayden Quarry Road will consist of a 16' shoulder on the south side and a 21' shoulder on the north side. The 21' shoulder will contain curb and gutter, a 10' sidewalk and a 6' planting strip. Trees are proposed in the median and in the 6' planting strip on each side of the roadway. Street and pedestrian scale lighting are also proposed along the shoulders. The proposed project also includes widening Turner Hill Road to Mall Parkway. The widening includes adding left and right turn lanes at the Turner Hill Road/Mall Parkway intersection as well as the Turner Hill Road/Hayden Quarry Road intersection. The project will also include a new traffic signal at Turner Hill Road and Hayden Quarry Road and signal relocation at Iris Drive and Sigman Road.

Environmental concerns include requiring a COE 404 Permit; an Environmental Assessment will be prepared; a public hearing open house will be held; time saving procedures are not appropriate.

David Studstill

Page 2

P. I. Nos. 0006888/0006931, DeKalb-Rockdale

August 30, 2006

The estimated costs for these projects are:

CSSTP-0006-00(888) DeKalb

	<u>PROPOSED</u>	<u>APPROVED</u>	<u>FUNDING</u>	<u>PROG DATE</u>
Construction (includes E&C and inflation)	\$9,813,000	\$1,500,000	L230	2009
Right-of-Way & Utilities*	Local	Local	Local	

CSSTP-0006-00(931) Rockdale

	<u>PROPOSED</u>	<u>APPROVED</u>	<u>FUNDING</u>	<u>PROG DATE</u>
Construction (includes E&C and inflation)	\$15,238,000	\$3,023,000	L230	2009(proposed)
Right-of-Way & Utilities*	Local	Local	Local	

*PMA sent requesting Rockdale County do PE and utilities; right-of-way and construction to be done by future agreements 8-3-06

The Hayden Quarry Road/Sigman Road extension will provide the additional access to I-20 via the Sigman Road interchange. I recommend this project concept be approved and Alternative 3 be implemented.

GRS:JDQ/cj

Attachment

CONCUR



Todd I. Long, P.E., Director of Preconstruction

APPROVE



David E. Studstill, Jr., P.E., Chief Engineer

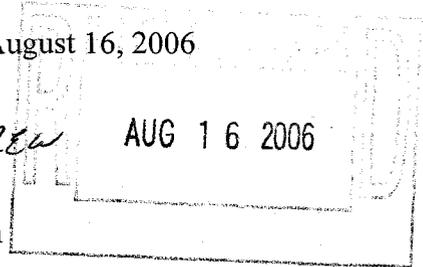
**DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA**

INTERDEPARTMENTAL CORRESPONDENCE

FILE: STP-0006-00(888) DeKalb **OFFICE:** Engineering Services
STP-0006-00(931) Rockdale
P.I. Nos. 0006888 & 0006931
Hayden Quarry Road/Sigman Road Extension

DATE: August 16, 2006

FROM: Brian K. Summers, P.E., Project Review Engineer
TO: Meg Pirkle, P.E., Assistant Director of Preconstruction



SUBJECT: CONCEPT REPORT

We have reviewed the Concept Report submitted August 14, 2006, and have the following comment:

- Page 6 of the Concept Report notes that both projects will be let by GDOT, however; TPro shows that STP-0006-00(888) will be let by DeKalb County. Please resolve.

The costs for this project are:

	<u>STP-0006-00(888)</u>	<u>STP-0006-00(931)</u>
Construction	\$8,091,525	\$7,139,900
Inflation	\$829,381	\$731,840
E & C	\$892,091	\$787,174
Reimbursable Utilities	\$92,000 (Locals)	\$108,000 (Locals)
Right of Way	\$562,500 (Locals)	\$1,250,000 (Locals)

REW

c: Bryant Poole, Attn.: Mike Lobdell

DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA

District 7

PROJECT CONCEPT REPORT

Hayden Quarry Road/Sigman Road Extension

Project Number: STP-0006-00(888) & STP-0006-00(931)

Counties: DeKalb and Rockdale

P. I. Number: 0006888 & 0006931

Federal Route Number: N/A

State Route Number: N/A

PROJECT LOCATION MAP: See Page 2

Recommendation for approval:

DATE 8/11/06

Phil Y. Smith

Project Manager

DATE 8/14/06

Bry H. Hoo

District Engineer

The concept as presented herein and submitted for approval is consistent with that which is included in the Regional Transportation Plan (RTP) and/or the State Transportation Improvement Program (STIP).

DATE _____

State Transportation Planning Administrator

DATE _____

Office of Financial Management Administrator

DATE _____

State Environmental/Location Engineer

DATE _____

State Traffic Safety and Design Engineer

DATE 8/16/06

Brian K. Sumner *PLA*

Project Review Engineer

DATE _____

State Bridge Engineer

SCORING RESULTS AS PER MOG 2440-2

Project Number: STP-0006-00(888) & STP-0006-00(931)		County: DeKalb/ Rockdale		PI No.: 0006888 & 0006931	
Report Date: August 14, 2006		Concept By: DOT Office: District 7			
<input checked="" type="checkbox"/> Concept Stage		Consultant: Kimley-Horn & Associates, Inc.			
Project Type: Choose One From Each Column		<input checked="" type="checkbox"/> Major <input type="checkbox"/> Minor	<input checked="" type="checkbox"/> Urban <input type="checkbox"/> Rural	<input type="checkbox"/> ATMS	<input type="checkbox"/> Bridge Replacement
				<input type="checkbox"/> Building	<input type="checkbox"/> Interchange Reconstruction
				<input type="checkbox"/> Intersection Improvement	<input type="checkbox"/> Interstate
				<input type="checkbox"/> New Location	<input checked="" type="checkbox"/> Widening & Reconstruction
				<input type="checkbox"/> Miscellaneous	
FOCUS AREAS	SCORE	RESULTS			
Presentation	100				
Judgement	100				
Environmental	100				
Right of Way	100				
Utility	100				
Constructability	100				
Schedule	100				

**DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA**

INTERDEPARTMENTAL CORRESPONDENCE

FILE: STP-0006-00(888) DeKalb
STP-0006-00(931) Rockdale
P.I. Nos. 0006888 & 0006931
Hayden Quarry Road/Sigman Road Extension

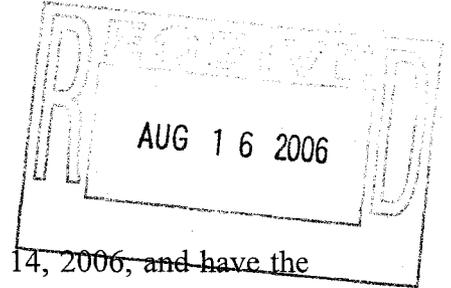
OFFICE: Engineering Services

DATE: August 16, 2006

FROM: Brian K. Summers, P.E., Project Review Engineer *REW*

TO: Meg Pirkle, P.E., Assistant Director of Preconstruction

SUBJECT: CONCEPT REPORT



We have reviewed the Concept Report submitted August 14, 2006, and have the following comment:

- Page 6 of the Concept Report notes that both projects will be let by GDOT, however; TPro shows that STP-0006-00(888) will be let by DeKalb County. Please resolve.

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	<u>STP-0006-00(888)</u>	<u>STP-0006-00(931)</u>
Construction	\$8,091,525	\$7,139,900
Inflation	\$829,381	\$731,840
E & C	\$892,091	\$787,174
Reimbursable Utilities	\$92,000 (Locals)	\$108,000 (Locals)
Right of Way	\$562,500 (Locals)	\$1,250,000 (Locals)

REW

c: Bryant Poole, Attn.: Mike Lobdell

DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA

District 7

PROJECT CONCEPT REPORT

Hayden Quarry Road/Sigman Road Extension

Project Number: STP-0006-00(888) & STP-0006-00(931)

Counties: DeKalb and Rockdale

P. I. Number: 0006888 & 0006931

Federal Route Number: N/A

State Route Number: N/A

PROJECT LOCATION MAP: See Page 2

Recommendation for approval:

DATE 8/11/06



Project Manager

DATE 8/14/06



District Engineer

The concept as presented herein and submitted for approval is consistent with that which is included in the Regional Transportation Plan (RTP) and/or the State Transportation Improvement Program (STIP).

DATE _____

State Transportation Planning Administrator

DATE _____

Office of Financial Management Administrator

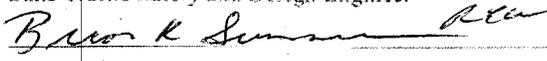
DATE _____

State Environmental/Location Engineer

DATE _____

State Traffic Safety and Design Engineer

DATE 8/16/06



Project Review Engineer

DATE _____

State Bridge Engineer

SCORING RESULTS AS PER MOG 2440-2

Project Number: STP-0006-00(888) & STP-0006-00(931)		County: DeKalb/ Rockdale		PI No.: 0006888 & 0006931	
Report Date: August 14, 2006		Concept By: DOT Office: District 7			
<input checked="" type="checkbox"/> Concept Stage		Consultant: Kimley-Horn & Associates, Inc.			
Project Type: Choose One From Each Column		<input checked="" type="checkbox"/> Major <input type="checkbox"/> Minor	<input checked="" type="checkbox"/> Urban <input type="checkbox"/> Rural	<input type="checkbox"/> ATMS	<input type="checkbox"/> Bridge Replacement
				<input type="checkbox"/> Building	<input type="checkbox"/> Interchange Reconstruction
				<input type="checkbox"/> Intersection Improvement	<input type="checkbox"/> Interstate
				<input type="checkbox"/> New Location	<input checked="" type="checkbox"/> Widening & Reconstruction
				<input type="checkbox"/> Miscellaneous	
FOCUS AREAS	SCORE	RESULTS			
Presentation	100				
Judgement	100				
Environmental	100				
Right of Way	100				
Utility	100				
Constructability	100				
Schedule	100				

RECEIVED
AUG 15 2006
BY: _____

DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA
District 7

PROJECT CONCEPT REPORT
Hayden Quarry Road/Sigman Road Extension

Project Number: STP-0006-00(888) & STP-0006-00(931)
Counties: DeKalb and Rockdale
P. I. Number: 0006888 & 0006931
Federal Route Number: N/A
State Route Number: N/A

PROJECT LOCATION MAP: See Page 2.

Recommendation for approval:

DATE 8/11/06

Phil Schmitt

Project Manager

DATE 8/14/06

Ben Hoo

District Engineer

The concept as presented herein and submitted for approval is consistent with that which is included in the Regional Transportation Plan (RTP) and/or the State Transportation Improvement Program (STIP).

DATE 8/15/06

Joseph P. Plude
State Transportation Planning Administrator

DATE _____

Office of Financial Management Administrator

DATE _____

State Environmental/Location Engineer

DATE _____

State Traffic Safety and Design Engineer

DATE _____

Project Review Engineer

DATE _____

State Bridge Engineer

DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA

District 7

PROJECT CONCEPT REPORT

Hayden Quarry Road/Sigman Road Extension

Project Number: STP-0006-00(888) & STP-0006-00(931)

Counties: DeKalb and Rockdale

P. I. Number: 0006888 & 0006931

Federal Route Number: N/A

State Route Number: N/A

PROJECT LOCATION MAP: See Page 2

Recommendation for approval:

DATE 8/11/06



Project Manager

DATE 8/14/06



District Engineer

The concept as presented herein and submitted for approval is consistent with that which is included in the Regional Transportation Plan (RTP) and/or the State Transportation Improvement Program (STIP).

DATE _____

State Transportation Planning Administrator

DATE _____

Office of Financial Management Administrator

DATE _____

State Environmental Location Engineer

DATE 8-21-06



State Traffic Safety and Design Engineer

DATE _____

Project Review Engineer

DATE _____

State Bridge Engineer

DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA
District 7

PROJECT CONCEPT REPORT

Hayden Quarry Road/Sigman Road Extension

Project Number: STP-0006-00(888) & STP-0006-00(931)

Counties: DeKalb and Rockdale

P. I. Number: 0006888 & 0006931

Federal Route Number: N/A

State Route Number: N/A

PROJECT LOCATION MAP: See Page 2

Recommendation for approval:

DATE 8/11/06



Project Manager

DATE 8/14/06



District Engineer

The concept as presented herein and submitted for approval is consistent with that which is included in the Regional Transportation Plan (RTP) and/or the State Transportation Improvement Program (STIP).

DATE _____

State Transportation Planning Administrator

DATE _____

Office of Financial Management Administrator

DATE _____

State Environmental/Location Engineer

DATE _____

State Traffic Safety and Design Engineer

DATE _____

Project Review Engineer

DATE 8/28/06



State Bridge Engineer

Quarles, Johnny

From: Woods, Sam
Sent: Wednesday, August 30, 2006 3:15 PM
To: Quarles, Johnny
Subject: Hayden Quarry Road/Sigman Road PI# 0006888 & 0006931
Attachments: 0006888 0006931 Concept for Approval.pdf

Johnny,

Please see below for responses to your questions from this morning. The attached concept report has been updated so that the alternatives are labeled correctly. Please let me know if you need anything else.

Thanks,

Sam Woods
GDOT - District 7 Preconstruction
5025 New Peachtree Road
Chamblee, GA 30341
Phone: 404-463-4947
Fax: 770-986-1022

From: Woods, Sam [mailto:Sam.Woods@dot.state.ga.us]
Sent: Wednesday, August 30, 2006 11:30 AM
To: Lindsey, Steven R
Cc: Wright, Taylor P; Crabtree, Ted
Subject: Hayden Quarry Road/Sigman Road PI# 0006888 & 0006931

Steve,

The concept report for this project is under approval across the street. The preconstruction office there had a couple questions:

1. Funding – Our status sheets show construction in FY08 for PI# 0006888 and FY09 for PI# 0006931. This caught their eye. I checked the TIP, and both are proposed for FY09 construction. I assume we are shooting for FY09 like it says in the TIP. Is this correct? Correct.
2. Bridge – The concept report says the bridge is 100' wide. I assume we are carrying the entire typical (48' in lanes, 20' median, and 32' in shoulders) across the bridge. Will there actually be 2 separate bridges, or will it be one bridge that carries the median width across? Our intent is to carry the median across the bridge, so it will just be one bridge.
3. "Other alternates considered" in the concept report do match the labels on the Alternates Layout that was attached to the concept report (A, B, B1 vs. 1, 2, 3). Please have the consultant update this so they match and resubmit a PDF of the concept report to me. I have coordinated with the consultant to get this corrected. We should be able to get the revised report to you this afternoon or tomorrow morning.

Thanks,

Sam Woods
GDOT - District 7 Preconstruction
5025 New Peachtree Road
Chamblee, GA 30341

8/31/2006

DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA

INTERDEPARTMENTAL CORRESPONDENCE

FILE: STP-0006-00(888), Dekalb County
SIP-0006-00(931), Rockdale County
Hayden Quarry Road/Sigman Road Extension
PI# 0006888 & 0006931

OFFICE: Chamblee\Metro

DATE: August 11, 2006

FROM: ^{BP} Bryant Poole, District Engineer

TO: Meg Pirkle, P.E., Assistant Director of Preconstruction

SUBJECT: *PROJECT CONCEPT REPORT*

Attached is the original copy of the concept report for your further handling for approval in accordance with the PDP.

If you have any questions in regards to this concept, please contact Sam Woods at (404) 463-4947.

BP\WSL\saw

cc: Keith Golden
David Mulling
Harvey Keepler
Joe Palladi
Jamie Simpson
File

**DEPARTMENT OF TRANSPORTATION
STATE OF GEORGIA**

District 7

PROJECT CONCEPT REPORT

Hayden Quarry Road/Sigman Road Extension

Project Number: STP-0006-00(888) & STP-0006-00(931)

Counties: DeKalb and Rockdale

P. I. Number: 0006888 & 0006931

Federal Route Number: N/A

State Route Number: N/A

PROJECT LOCATION MAP: See Page 2

Recommendation for approval:

DATE 8/11/06



Project Manager

DATE 8/14/06



District Engineer

The concept as presented herein and submitted for approval is consistent with that which is included in the Regional Transportation Plan (RTP) and/or the State Transportation Improvement Program (STIP).

DATE _____

State Transportation Planning Administrator

DATE _____

Office of Financial Management Administrator

DATE _____

State Environmental/Location Engineer

DATE _____

State Traffic Safety and Design Engineer

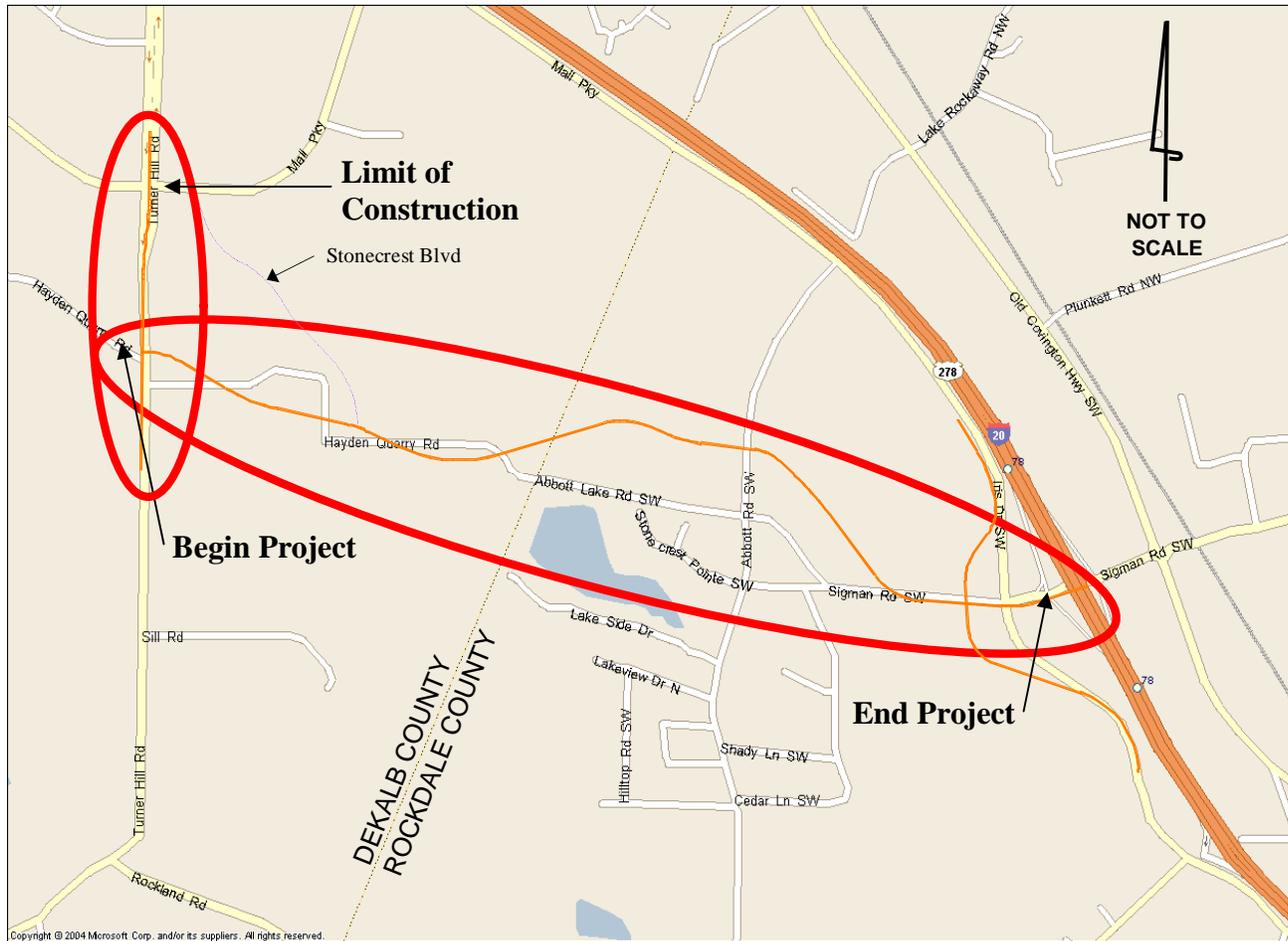
DATE _____

Project Review Engineer

DATE _____

State Bridge Engineer

Project Location Map



Project: STP-0006-00(888) & STP-0006-00(931)
PI No.: 0006888 & 0006931
Description: Hayden Quarry Road/Sigman Road Extension

Need and Purpose: The eastern edge of DeKalb County and western edge of Rockdale County along I-20 is experiencing major development in the area of the new Mall at Stonecrest. Based on the overall masterplan for the mall area, as well as additional proposed development information available for Rockdale County in the vicinity of the mall, approximately 1,969 residential units, 2.6 million square feet of retail/restaurant, 450 hotel rooms, and 860,000 square feet of office are expected in the Turner Hill Road area. It is estimated that these proposed developments will account for an additional 131,650 daily trips in the surrounding roadway network. The development in this area also includes two Developments of Regional Impact (DRI) that will increase travel demand in the area.

Currently, access to I-20 in this area is available through an existing interchange at Turner Hill Road, approximately ¼ mile north of Mall Parkway or through an interchange at Sigman Road, via Mall Parkway/Iris Drive. As an approximate 2-mile two-lane facility, however, Iris Drive is not considered a viable alternative route for access to I-20. The existing daily traffic count along Iris Drive is 6,078 vehicles.

With the additional traffic from the planned area developments, it is projected that existing infrastructure will not be able to provide adequate capacity to serve the expected demand. A review of the traffic projections in the ARC Travel Demand Model reveals that 26,750 daily vehicle trips are projected along an east-west connection between Sigman Road and Turner Hill Road.

In anticipation of this need, the Hayden Quarry Road/Sigman Road Extension project was created. This project is currently listed in the Atlanta Regional Commission (ARC) Regional Transportation Plan (RTP), Mobility 2030, and is included in the FY 2006-2011 Transportation Improvement Program (TIP). This project is also included in the ARC Regional Travel Demand Model. The project has three ARC numbers, two for DeKalb County (DK-327A, DK-327B) and one for Rockdale County (RO-235A). This project is part of a larger system wide improvement in the area that will include widening of Turner Hill Road south to the intersection with McDaniel Mill Road.

The Hayden Quarry Road/Sigman Road Extension will provide the additional access to I-20 via the Sigman Road Interchange. The project will terminate at two major traffic generators. These termini will be The Mall at Stonecrest area on the west side of the project and the existing I-20 interchange at Sigman Road on the east side of the project. To facilitate traffic flow from the Mall at Stonecrest area to the proposed roadway a 1200' section of Turner Hill Road, from Mall Parkway to the proposed intersection with Hayden Quarry Road, will be widened to a four lane median divided roadway.

This project also includes significant pedestrian features along with a four lane median divided roadway. The sidewalk on the north side of the proposed road will be a 10' sidewalk and will connect to a proposed trail system running along both Stonecrest Boulevard and Turner Hill Road. With the large residential development progressing in this area and a connection to area trails included with this project, short vehicular trips in the area should be reduced.

Traffic engineering analyses were performed for the proposed Hayden Quarry Road/Sigman Road Extension. These analyses projected future development traffic using *ITE Trip Generation* rates, and assigned the future development traffic to the roadway surrounding network based on a review of existing turning movement counts at eight intersections - including the I-20/Turner Hill Road and I-

20/Sigman Road interchanges.

The traffic analyses projected approximately 19,543 daily vehicle trips along the proposed Hayden Quarry Road/Sigman Road Extension in the Design Year of 2029. Additional Traffic Engineering data, analysis, and conclusions are discussed in the attached Traffic Study.

Description of the proposed project: The Hayden Quarry Road Extension will be a 1.8 mile roadway connecting Turner Hill Road in DeKalb County to Sigman Road in Rockdale County. The project consists of 0.84 miles of roadway in DeKalb and 0.97 miles of roadway in Rockdale. The roadway will be a four lane divided highway with sidewalks, lighting, and landscaping. It will be designed to meet 35 mph design speed and will serve as an important east-west connection in this part of DeKalb and Rockdale Counties. The project begins approximately 1000' west of the Turner Hill intersection with existing Hayden Quarry Road and ends at the on/off ramps just west of Interstate 20. The section of Hayden Quarry Road from Turner Hill to Stonecrest Boulevard will be widened from 2 lanes. The remaining portion of Hayden Quarry Road will be a new location roadway. The proposed project also includes widening Turner Hill Road to Mall Parkway. The widening includes adding left and right turn lanes at the Turner Hill Road/Mall Boulevard Intersection as well as the Turner Hill Road/Hayden Quarry Road Intersection. The project will also include a new traffic signal at Turner Hill Road and Hayden Quarry Road and traffic signal relocation at Iris Drive and Sigman Road. Landscaping, Pedestrian Lighting, and Street Lighting will be included in this project. Utility relocations, other than when a direct conflict exists, are not within the scope of this project.

Is the project located in a Non-attainment area? Yes No.

This project is reflected in the current transportation improvement program (TIP) and conforms with the current non-attainment model.

PDP Classification: Major

Federal Oversight: Full Oversight (), Exempt (X), State Funded (), or Other ()

Functional Classification: Urban Arterial

U. S. Route Number(s): N/A

State Route Number(s): N/A

Traffic (AADT):

Current Year (2009): 11,927

Design Year (2029): 19,543

Existing design features:

- Typical Section: N/A
- Posted speed: 35 mph
- Maximum radius of curve: 610'

- Maximum grade: 6 % - Hayden Quarry Road
3 % - Turner Hill Road
6 % - Iris Drive
- Width of right of way: N/A
- Major structures: Honey Creek Bridge
- Major interchanges or intersections along the project: Hayden Quarry Road and Turner Hill Road; Hayden Quarry Road and Iris Drive

Proposed Design Features:

- Proposed typical section(s): Two 12-foot travel lanes in each direction separated by a 20-foot raised grass median. From beginning of project to Stonecrest Boulevard, the shoulders will be 16' with curb and gutter in each directions. They will consist of 5' sidewalks and a 6' planting strip. The remainder of the project along Hayden Quarry Road will consist of a 16' shoulder on the south side, and a 21' shoulder on the north side. The 21' shoulder will contain curb and gutter, a 10' sidewalk and a 6' planting strip. Trees are proposed in the median and in the 6' planting strip on each side of the roadway. Street and pedestrian scale lighting are also proposed along the shoulders. (See the attached typical section).
- Proposed Design Speed Mainline: 35 mph
- Proposed Maximum grade Mainline: 6 % Maximum grade allowable: 8 %.
- Proposed Maximum grade Side Street : 6 % Maximum grade allowable: 8 %.
- Proposed Maximum grade driveway N/A
- Proposed Minimum radius of curve: 371' Minimum radius allowable: 371'
- Right of way
 - Width: 126' minimum
 - Easements: Temporary (X), Permanent (X), Utility (), Other ().
 - Type of access control: Full (), Partial (), By Permit (X), Other ().
 - Number of parcels: 14 Number of displacements: 0
 - Business: 0
 - Residences: 0
 - Mobile homes: 0
 - Other: 0
- Structures:
 - Bridges: The proposed concrete bridge over Honey Creek will be 100 ft. wide and 200 ft. long.
 - Retaining walls: None anticipated
- Major intersections and interchanges: Hayden Quarry Road and Turner Hill Road; Hayden Quarry Road and Iris Drive
- Traffic control during construction: On site traffic control will be utilized during construction on existing alignments.

- Design Exceptions to controlling criteria anticipated:

	<u>UNDETERMINED</u>	<u>YES</u>	<u>NO</u>
HORIZONTAL ALIGNMENT:	()	()	(X)
ROADWAY WIDTH:	()	()	(X)
SHOULDER WIDTH:	()	()	(X)
VERTICAL GRADES:	()	()	(X)
CROSS SLOPES:	()	()	(X)
STOPPING SIGHT DISTANCE:	()	()	(X)
SUPERELEVATION RATES:	()	()	(X)
HORIZONTAL CLEARANCE:	()	()	(X)
SPEED DESIGN:	()	()	(X)
VERTICAL CLEARANCE:	()	()	(X)
BRIDGE WIDTH:	()	()	(X)
BRIDGE STRUCTURAL CAPACITY:	()	()	(X)

- Environmental concerns: Anticipated individual permit for Section 404.
- Level of environmental analysis:
 - Are Time Savings Procedures appropriate? Yes (), No (X),
 - Categorical exclusion (),
 - Environmental Assessment/Finding of No Significant Impact (FONSI) (X), or
 - Environmental Impact Statement (EIS) ().
- Utility involvements:
 - Electric: Georgia Power, Snapping Shoals EMC
 - Gas: Atlanta Gas Light
 - Communications: Bellsouth, Comcast, Atlanta Gas Light Networks
 - Water and Sewer: DeKalb Water and Sewer

Project responsibilities:

- Design: DeKalb and Rockdale Counties
- Right of Way Acquisition: DeKalb and Rockdale Counties
- Relocation of Utilities: DeKalb and Rockdale Counties
- Letting to contract: DeKalb and Rockdale Counties
- Supervision of construction: DeKalb and Rockdale Counties
- Providing material pits: contractor
- Providing detours: N/A

Coordination

- Initial Concept Meetings: held 10/26/2005 & 2/28/06 (Minutes attached)
- Concept Meeting: held 6/22/06 (Minutes attached)
- P. A. R. meetings, dates and results: Anticipated to be completed during the project development.
- FEMA, USCG, and/or TVA: Anticipated coordination with USACE.
- Public involvement: Public Information Open House (PIOH) & Public Hearing Open House (PHOH) to be held
- Other projects in the area: STP-0006-00(891); P.I.# 0006891 – Turner Hill Road Widening; P.I.# 0008044 – Klondike Bike/Ped Path
- Other coordination to date: N/A

Scheduling – Responsible Parties’ Estimate

- Time to complete the environmental process: 18 Months.
- Time to complete preliminary construction plans: 9 Months.
- Time to complete right of way plans: 3 Months.
- Time to complete the Section 404 Permit: 12 Months
- Time to complete final construction plans: 6 Months.
- Time to complete to purchase right of way: 10 Months.
- List other major items that will affect the project schedule: N/A

Other alternates considered: See attached Alternates Layout for more details.

Alternate 1 – The No Build alternate was considered, but not analyzed in detail, because it would offer no improvement to traffic flow, congestion, or safety in the project area.

Alternate 2 – This alternate offered a more direct east-west route. On the eastern end of the project, the alignment ran behind houses fronting Abbott Lake Road. The alternate was eliminated since a perennial stream would be greatly impacted. The road would run parallel to the stream.

Alternate 3 – This is the preferred alternate. It crosses Honey Creek at the existing crossing, which minimizes wetland impacts. The alignment runs north of the existing homes along Abbott Lake Road and avoids the perennial stream mentioned in Alternate 2.

Comments: None

Attachments:

1. Cost Estimates:
 - a. Construction including E&C,
 - b. Right of Way, and
 - c. Utilities.
2. Typical sections
3. Traffic Study
4. Minutes of Initial Concept Meetings (10/26/05 & 2/28/06)
5. Minutes of Concept Team Meeting (6/22/06)
6. Alternates Layout

PRELIMINARY COST ESTIMATE

PROJECT NUMBER: STP-0006-00(888) & STP-0006-00(931) **COUNTY:** DEKALB
DATE: 8/10/2006 **ESTIMATED LETTING DATE:**
PREPARED BY: Kimley-Horn and Associates **PROJECT LENGTH:** 0.84 miles

() PROGRAMMING PROCESS (x) CONCEPT DEVELOPMENT () DURING PROJECT DEV.

PROJECT COST	
A. RIGHT-OF-WAY:	
1. PROPERTY (LAND & EASEMENT)	\$450,000
2. DISPLACEMENTS; RES: 0, BUS; 0, M.H.: 0	\$0
3. OTHER COST (ADM./COST, INFLATION)	\$112,500
SUBTOTAL: A	\$562,500
B: REIMBURSEABLE UTILITIES:	
1. RAILROAD	\$0
2. TRANSMISSION LINES	\$0
3. SERVICES (Water, Sewer, Gas, Electric, Cable)	\$92,000
SUBTOTAL: B	\$92,000
C: CONSTRUCTION:	
1. MAJOR STRUCTURES	
a. Bridge	\$1,600,000
SUBTOTAL: C-1	\$1,600,000
2. GRADING AND DRAINAGE:	
a. EARTHWORK (incl. GRADING):	\$920,000
b. DRAINAGE:	
1) Cross Drain Pipe	\$18,400
(230' of 36" pipe @ \$80/ft)	
2) Curb and Gutter (18,700 ft @ \$25/ft)	\$467,500
3) Longitudinal System (incl. catch basins)	\$229,000
(4450ft of 24" RCP @ \$40/ft- \$178,000)	
(30 Catch Basins @ \$1700/EA - \$51,000)	
SUBTOTAL: C-2	\$1,634,900
3. BASE AND PAVING:	
a. AGGREGATE BASE: 26400 TN @ \$25/TN	SUBTOTAL: C-3a \$660,000
b. ASPH. PAVING: Surface: 3175 TN @ \$115/TN	\$365,125
Binder: 4230 TN @ \$100/TN	\$423,000
Base: 12750 TN @ \$90/TN	\$1,147,500
SUBTOTAL: C-3b	\$1,935,625
c. CONCRETE PAVING	
d. OTHER	
SUBTOTAL: C-3	\$2,595,625
4. LUMP ITEMS:	
a. GRASSING: 8 AC	\$25,500
b. CLEARING AND GRUBBING: (14 AC @ \$8300/AC)	\$120,000
c. LANDSCAPING: 176 EA overstory trees @ \$500/EA	\$103,000
88 EA understory trees @ \$170/EA	
d. EROSION CONTROL: 1 MILE @ (\$45000/MILE)	\$45,000
e. TRAFFIC CONTROL	\$37,500
f. LIGHTING	
Pedestrian scale lighting (50 ft o.c. - 176 EA @ \$5500/EA)	\$968,000
Street lighting (100 ft o.c. - 88 EA @ \$6500/EA)	\$572,000
SUBTOTAL: C-4	\$1,871,000
5. MISCELLANEOUS:	
a. TRAFFIC SIGNALS (\$75000 x 1 EA)	\$75,000
b. SIGNING & MARKING: (1.0 MILES @ \$15000/MILE)	\$15,000
c. GUARDRAIL:	
Type T (1000 ft @ \$35/ft)	\$35,000
d. SIDEWALK: (8833SY @ \$30/SY)	\$265,000
SUBTOTAL: C-5	\$390,000
6. SPECIAL FEATURES	
SUBTOTAL: C-6	\$0

PRELIMINARY COST ESTIMATE

PROJECT NUMBER: STP-0006-00(888) & STP-0006-00(931) **COUNTY:** ROCKDALE
DATE: 7/19/2006 **ESTIMATED LETTING DATE:**
PREPARED BY: Kimley-Horn and Associates **PROJECT LENGTH:** 0.97 miles

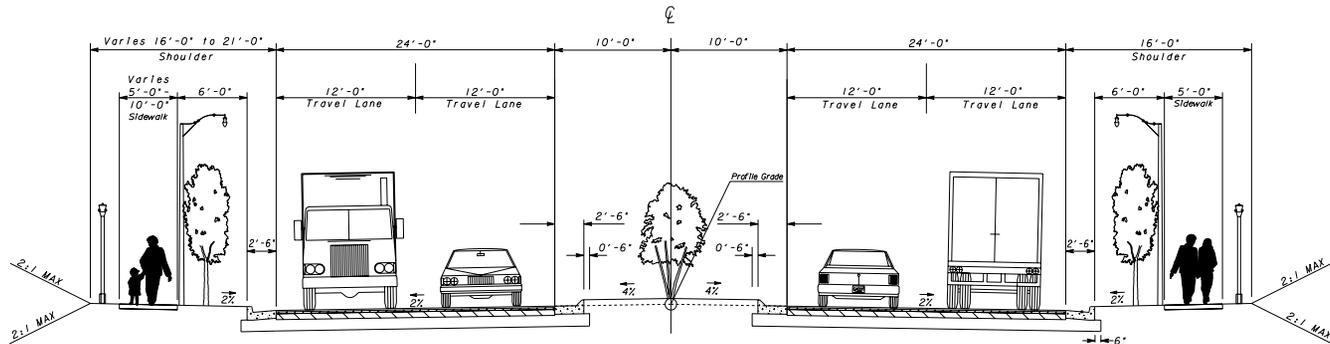
() PROGRAMMING PROCESS (x) CONCEPT DEVELOPMENT () DURING PROJECT DEV.

PROJECT COST	
A. RIGHT-OF-WAY:	
1. PROPERTY (LAND & EASEMENT)	\$1,000,000
2. DISPLACEMENTS; RES: 0, BUS; 0, M.H.: 0	\$0
3. OTHER COST (ADM./COST, INFLATION)	\$250,000
SUBTOTAL:A	\$1,250,000
B: REIMBURSEABLE UTILITIES:	
1. RAILROAD	\$0
2. TRANSMISSION LINES	\$0
3. SERVICES (Water,Sewer,Gas, Electric,Cable)	\$108,000
SUBTOTAL: B	\$108,000
C: CONSTRUCTION:	
1. MAJOR STRUCTURES	
a. Bridge	
SUBTOTAL: C-1	\$0
2. GRADING AND DRAINAGE:	
a. EARTHWORK (incl. GRADING):	
b. DRAINAGE:	
1) Cross Drain Pipe	\$21,600
(270' of 36" pipe @ \$80/ft)	
2) Curb and Gutter (20,400 ft @ \$25/ft)	\$510,000
3) Longitudinal System (incl. catch basins)	\$261,500
(5050ft of 24" RCP @ \$40/ft- \$202,000)	
(35 Catch Basins @ \$1700/EA - \$59,500)	
SUBTOTAL: C-2	\$1,873,100
3. BASE AND PAVING:	
a. AGGREGATE BASE: 28640 TN @ \$25/TN	SUBTOTAL:C-3a \$716,000
b. ASPH. PAVING: Surface: 3440 TN @ \$115/TN	\$395,600
Binder: 4570 TN @ \$100/TN	\$457,000
Base: 13780 TN @ \$90/TN	\$1,240,200
SUBTOTAL:C-3b	\$2,092,800
c. CONCRETE PAVING	
d. OTHER	
SUBTOTAL: C-3	\$2,808,800
4. LUMP ITEMS:	
a. GRASSING: 9 AC	\$30,000
b. CLEARING AND GRUBBING: (16 AC @ \$8300/AC)	\$130,000
c. LANDSCAPING: 206 EA overstory trees @ \$500/EA	\$120,500
103 EA understory trees @ \$170/EA	
d. EROSION CONTROL: 1 MILE @ (\$45000/MILE)	\$45,000
e. TRAFFIC CONTROL	\$37,500
f. LIGHTING	
Pedestrian scale lighting (50 ft o.c. - 206 EA @ \$5500/EA)	
Street lighting (100 ft o.c. - 103 EA @ \$6500/EA)	
SUBTOTAL: C-4	\$2,165,500
5. MISCELLANEOUS:	
a. TRAFFIC SIGNALS (\$75000 x 1 EA)	\$75,000
b. SIGNING & MARKING: (1.0 MILES @ \$15000/MILE)	\$15,000
c. GUARDRAIL:	
d. SIDEWALK: (6750SY @ \$30/SY)	\$202,500
SUBTOTAL: C-5	\$292,500
6. SPECIAL FEATURES	
SUBTOTAL: C-6	\$0

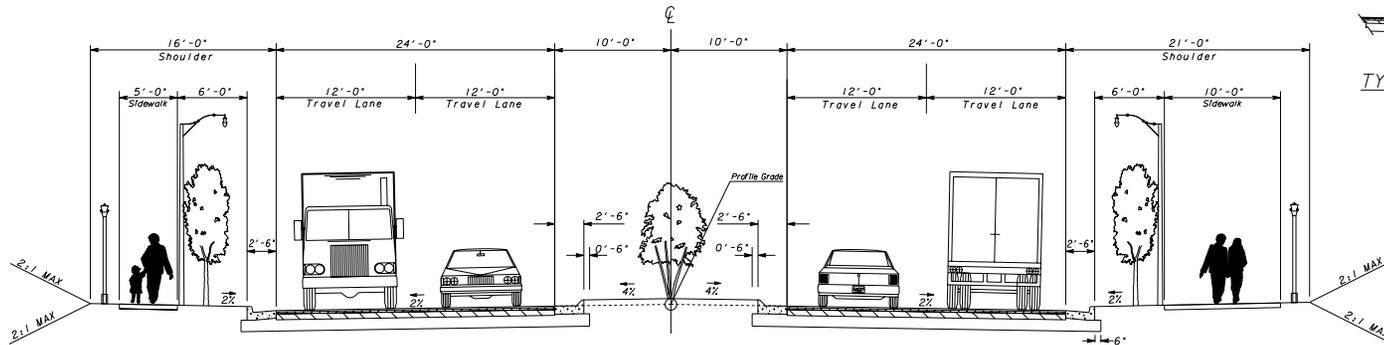
ESTIMATE SUMMARY TOTALS FOR DEKALB COUNTY		
A. RIGHT-OF-WAY		\$562,500
B. REIMBURSEABLE UTILITIES		\$92,000
C. CONSTRUCTION		
1. MAJOR STRUCTURES		\$1,600,000
2. GRADING AND DRAINAGE		\$1,634,900
3. BASE AND PAVING		\$2,595,625
4. LUMP ITEMS		\$1,871,000
5. MISCELLANEOUS		\$390,000
6. SPECIAL FEATURES		\$0
SUBTOTAL CONSTRUCTION COST		\$8,091,525
INFLATION (5% PER YEAR)		
NUMBER OF YEARS	2	\$829,381
E. & C. (10%):		\$892,091
TOTAL CONSTRUCTION COST		\$9,812,997
GRAND TOTAL PROJECT COST		\$10,467,497

ESTIMATE SUMMARY TOTALS FOR ROCKDALE COUNTY		
A. RIGHT-OF-WAY		\$1,250,000
B. REIMBURSEABLE UTILITIES		\$108,000
C. CONSTRUCTION		
1. MAJOR STRUCTURES		\$0
2. GRADING AND DRAINAGE		\$1,873,100
3. BASE AND PAVING		\$2,808,800
4. LUMP ITEMS		\$2,165,500
5. MISCELLANEOUS		\$292,500
6. SPECIAL FEATURES		\$0
SUBTOTAL CONSTRUCTION COST		\$7,139,900
INFLATION (5% PER YEAR)		
NUMBER OF YEARS	2	\$731,840
E. & C. (10%):		\$787,174
TOTAL CONSTRUCTION COST		\$8,658,914
GRAND TOTAL PROJECT COST		\$10,016,914

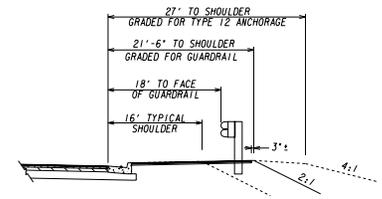
ESTIMATE SUMMARY TOTALS FOR DEKALB AND ROCKDALE COUNTIES		
A. RIGHT-OF-WAY		\$1,812,500
B. REIMBURSEABLE UTILITIES		\$200,000
C. CONSTRUCTION		
1. MAJOR STRUCTURES		\$1,600,000
2. GRADING AND DRAINAGE		\$3,508,000
3. BASE AND PAVING		\$5,404,425
4. LUMP ITEMS		\$4,036,500
5. MISCELLANEOUS		\$682,500
6. SPECIAL FEATURES		\$0
SUBTOTAL CONSTRUCTION COST		\$15,231,425
INFLATION (5% PER YEAR)		
NUMBER OF YEARS	2	\$1,561,221
E. & C. (10%):		\$1,679,265
TOTAL CONSTRUCTION COST		\$18,471,911
GRAND TOTAL PROJECT COST		\$20,484,411



TS 1 - FROM BEGINNING OF PROJECT TO IRIS DRIVE



TS -2 TURNER HILL ROAD



TYPICAL SHOULDER DETAIL FOR GUARDRAIL

Kimley-Horn and Associates, Inc.
Engineering, Planning, and Environmental Consultants
Suite 600, 3169 Holcomb Bridge Road
Norcross, Georgia 30071

REVISION DATES

STATE OF GEORGIA
DEPARTMENT OF TRANSPORTATION
OFFICE:

TYPICAL SECTION
HAYDEN QUARRY ROAD

DRAWING NO.

Traffic Study

Hayden Quarry Road Extension DeKalb County, Georgia

STP-0006-00(888) & STP-0006-00(931)

PI# 0006888 and 0006931

Prepared for:

DeKalb County

Prepared by:

Kimley-Horn and Associates, Inc.
Norcross, Georgia

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- Aerial Photograph
- Future Development Trip Generation Summary
- Capacity Analyses – Design Year 2029
- Traffic Counts

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1.0 INTRODUCTION

Hayden Quarry Road is a two-lane roadway located in east DeKalb County that is oriented in an east-west direction south of I-20 and The Mall at Stonecrest. Hayden Quarry Road currently terminates at its unsignalized intersection with Turner Hill Road. It is scheduled to be extended to the east into Rockdale County and tie in with existing Sigman Road at its intersection with Iris Drive.

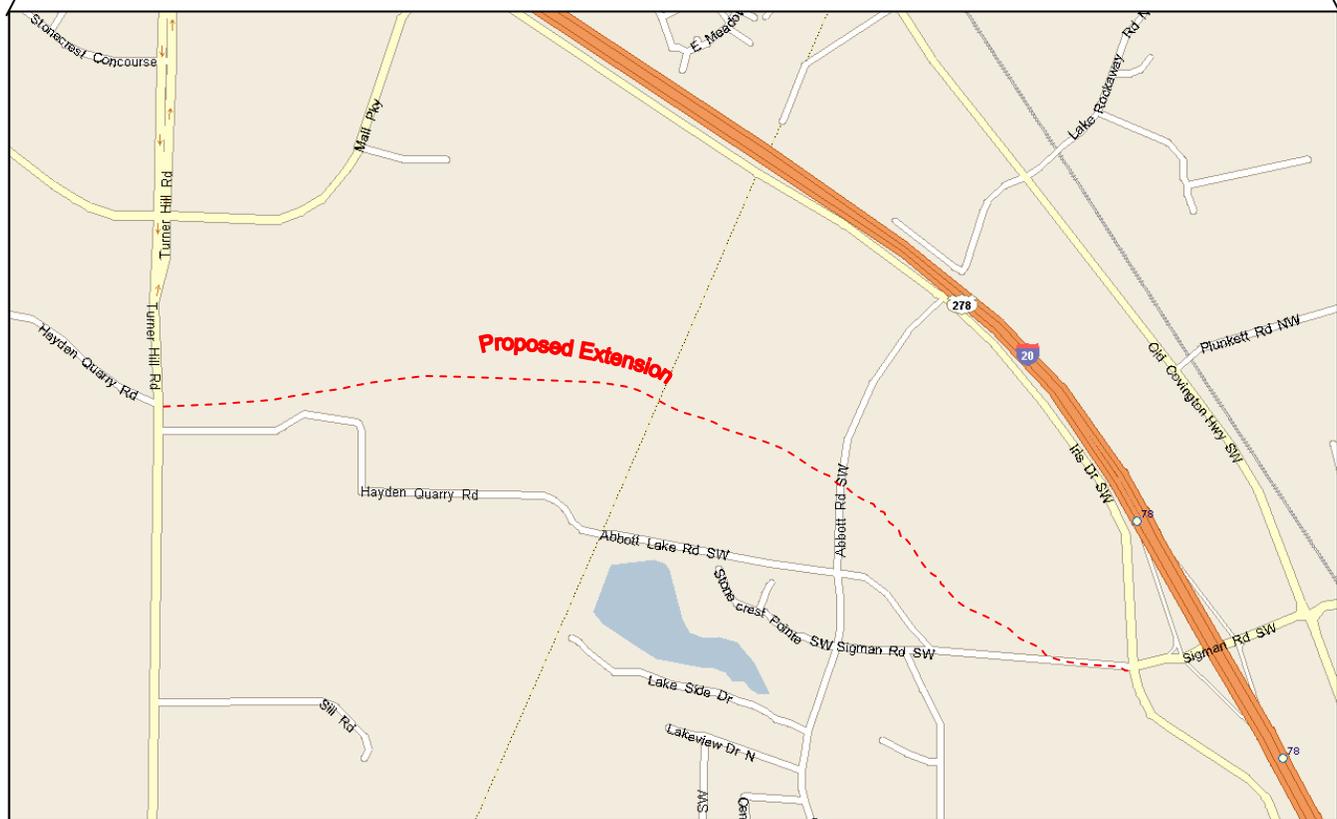
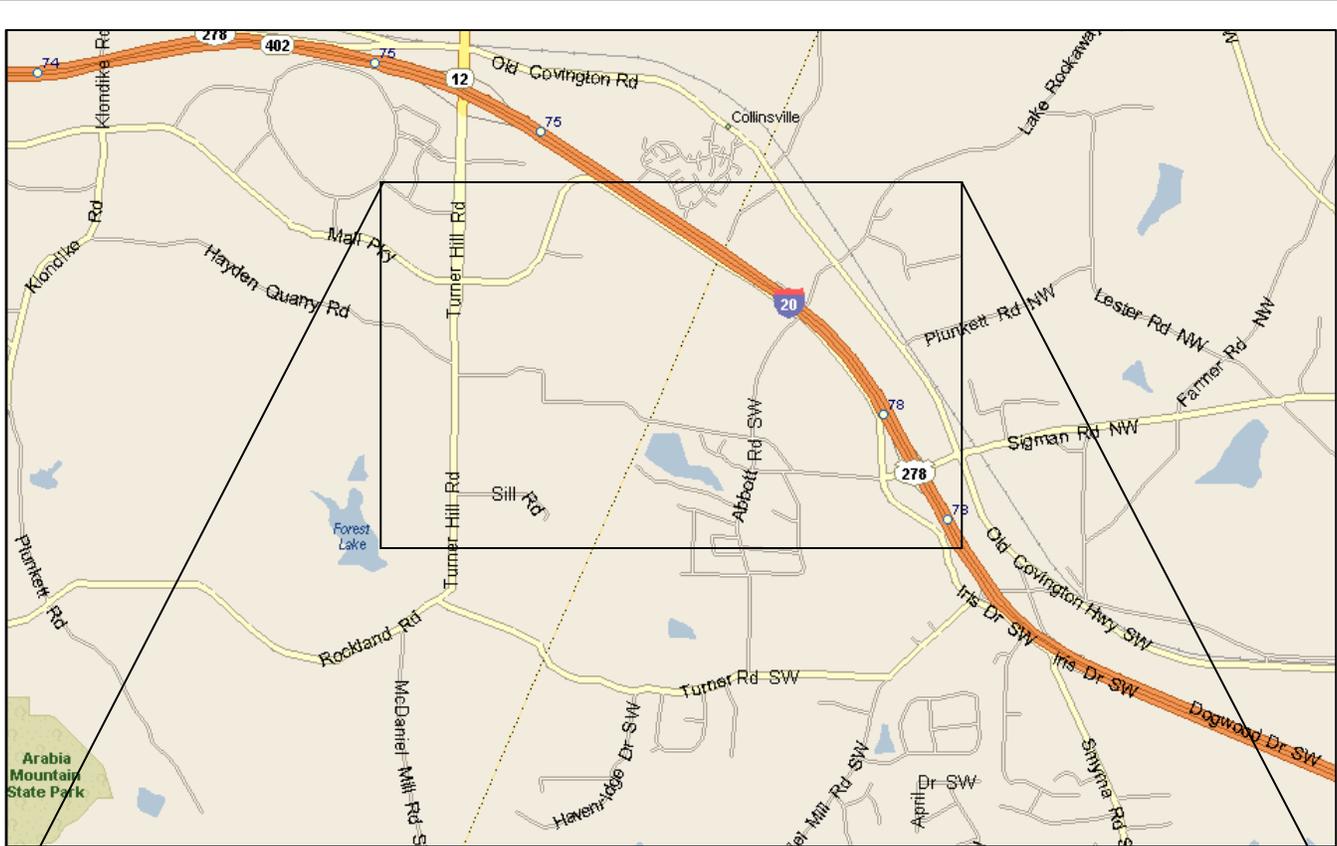
The Hayden Quarry Road Extension is planned to be constructed (base year) by year 2009 with a 2029 design year. **Figure 1** illustrates the location of the proposed project location. The proposed intersections of Hayden Quarry Road Extension/Turner Hill Road and Hayden Quarry Road Extension/Iris Drive were evaluated under projected design year 2029 traffic conditions. Additionally, the proposed Hayden Quarry Road Extension was evaluated under design year 2029 traffic conditions. For purposes of this report, level of service (LOS) D or better was considered to be an acceptable LOS and the 24-hour average daily traffic volume criterion to warrant construction of a four-lane roadway was 12,000 vehicles a day.

This report summarizes the data collection, analysis of projected traffic conditions, and conclusions from the analysis.

2.0 DATA COLLECTION

Vehicle turning movement volume counts were collected at eight intersections, within the vicinity of the proposed extension study area, during the AM peak and PM peak hours to quantify existing peak hour traffic conditions and patterns. The counts were collected at the following intersections:

- I-20 EB Ramps/Turner Hill Road
- I-20 EB Ramps/Turner Hill Road
- Turner Hill Road/Mall Parkway
- Turner Hill Road/Hayden Quarry Road
- Iris Drive/Abbott Road
- Iris Drive/Sigman Road
- I-20 EB/Sigman Road
- I-20 WB/Sigman Road



A 24-hour automatic tube count was conducted on Hayden Quarry Road just west of Turner Hill Road, on Iris Drive west of Abbott Road, on Sigman Road west of I-20, and on Sigman Road east of I-20 on Thursday, October 20, 2005. The 24-hour directional volumes were as follows:

- Hayden Quarry Road – 348 total (184 eastbound, 164 westbound)
- Iris Drive – 6,078 total (2,966 eastbound, 3,112 westbound)
- Sigman Road, west of I-20 – 14,343 total (7,102 eastbound, 7,241 westbound)
- Sigman Road, east of I-20 – 22,851 total (11,811 eastbound, 11,040 westbound)

All raw traffic count data is available in the Appendix.

3.0 DESIGN YEAR 2029 TRAFFIC ANALYSIS

The projected 2029 traffic conditions were developed based on future development and re-assignment of existing traffic due to the completion of the Hayden Quarry Road Extension.

The projected design year 2029 traffic conditions were analyzed for the intersections of Hayden Quarry Road Extension/Turner Hill Road and Hayden Quarry Road Extension/Iris Drive and the proposed four-lane roadway of Hayden Quarry Road Extension.

3.1 Future Development and Traffic Re-assignment

Future development plans were obtained for the area surrounding The Mall at Stonecrest, just north of the proposed Hayden Quarry Road Extension intersection with Turner Hill Road, as well as along the proposed Hayden Quarry Road Extension. It is estimated that over 2 million square feet of additional retail space will be developed in the mall area, including fast food, bank, restaurant, home furnishing, entertainment, and traditional retail uses. Additionally approximately 860,000 square feet of office space, 3 hotels, and 1,500 residential units are expected along and in the vicinity of the proposed Hayden Quarry Road Extension within DeKalb County, which will add traffic volumes onto the new proposed roadway.

Additionally, according to Rockdale County's *Future Land Use Map*, the land that Hayden Quarry Road Extension will cross is zoned low density residential; land immediately to the north, along Iris Drive, is zoned commercial. For purposes of this report, it was determined that 180 single-family

homes (approximately 2.5 units per acre) would be developed along Hayden Quarry Road Extension within Rockdale County, and approximately 540,000 square feet of retail would be developed along Iris Drive.

Trips generated by the projected development in both counties were assigned to the roadway network and incorporated as part of the design year 2029 traffic volumes, in lieu of using a projected background growth rate percentage.

Also, a percentage of volume along Iris Drive was relocated to the proposed Hayden Quarry Road Extension based on an analysis of the existing turning movement counts.

A trip generation summary for the expected future development is available in the Appendix.

3.2 Roadway/Intersection Laneage Recommendations

The projected design year 2029 roadway and intersection laneage recommendations were proposed to achieve LOS D or better during the AM and PM peak hours.

3.2.1 Hayden Quarry Road Extension

The Hayden Quarry Road Extension should be a four-lane roadway from Turner Hill Road to Iris Drive. The projected ADT along Hayden Quarry Road Extension for design year 2029 traffic conditions is approximately 19,543 vehicles between Turner Hill Road and Iris Drive. The ADT criteria established for this report to warrant a four-lane roadway is 12,000 vehicles a day. At this time, Hayden Quarry Road, west of Turner Hill Road should remain a two-lane roadway – until more concrete development plans exist along this section of roadway that would warrant additional widening.

3.2.2 Hayden Quarry Road Extension/Turner Hill Road Intersection

At the intersection of Hayden Quarry Road Extension/Turner Hill Road, a traffic signal should be installed. The eastbound Hayden Quarry Road approach should remain a single-lane approach. The westbound Hayden Quarry Road Extension approach should be constructed as a three-lane approach, with an exclusive left-turn lane (protected-permissive phasing), through lane, and free-flow right-turn lane. The westbound outside (northern) travel lane along Hayden Quarry Road should become the free-flow right-turn lane, leaving just one through lane traveling westbound through the proposed intersection. The northbound approach along Turner Hill Road at the intersection with Hayden Quarry

Road Extension should add a left-turn and right-turn lane, creating a three-lane approach. The southbound approach should provide dual left-turn lanes (protected-only phasing) onto the proposed Hayden Quarry Road Extension and a shared through/right-turn lane. Turner Hill Road should be widened to a four-lane facility from the intersection of Hayden Quarry Road Extension to Mall parkway. The inside southbound through lane should become the outside left-turn lane, leaving just one through lane traveling through the intersection with Hayden Quarry Road.

3.2.3 Hayden Quarry Road Extension/Iris Drive Intersection

At the intersection of Hayden Quarry Road/Iris Drive, the eastbound approach should consist of an exclusive left-turn lane (protected-permissive phasing), two through lanes, and an exclusive right-turn lane. The westbound approach should consist of an exclusive left-turn lane (protected-permissive phasing), two through lanes, and an exclusive right-turn lane. The northbound approach should maintain an exclusive left-turn lane (protected-permissive phasing), a single through lane, and an exclusive right-turn lane. The southbound approach should be improved to include an additional left-turn lane (creating dual left-turns with protected-only phasing), a single through lane, and an exclusive right-turn lane.

Additionally, the intersection of Iris Drive at Sigman Road/Hayden Quarry Road Extension should be relocated approximately 300' to the west to achieve a minimum of 660' between the proposed intersection and the I-20 eastbound ramp. Projected volumes through these two intersections are expected to be significant and additional spacing will help alleviate queueing and signal timing problems.

Figure 2 illustrates the projected design year 2029 traffic conditions and recommended roadway laneage to achieve LOS D or higher for the AM and PM peak periods.

3.3 *Level of Service*

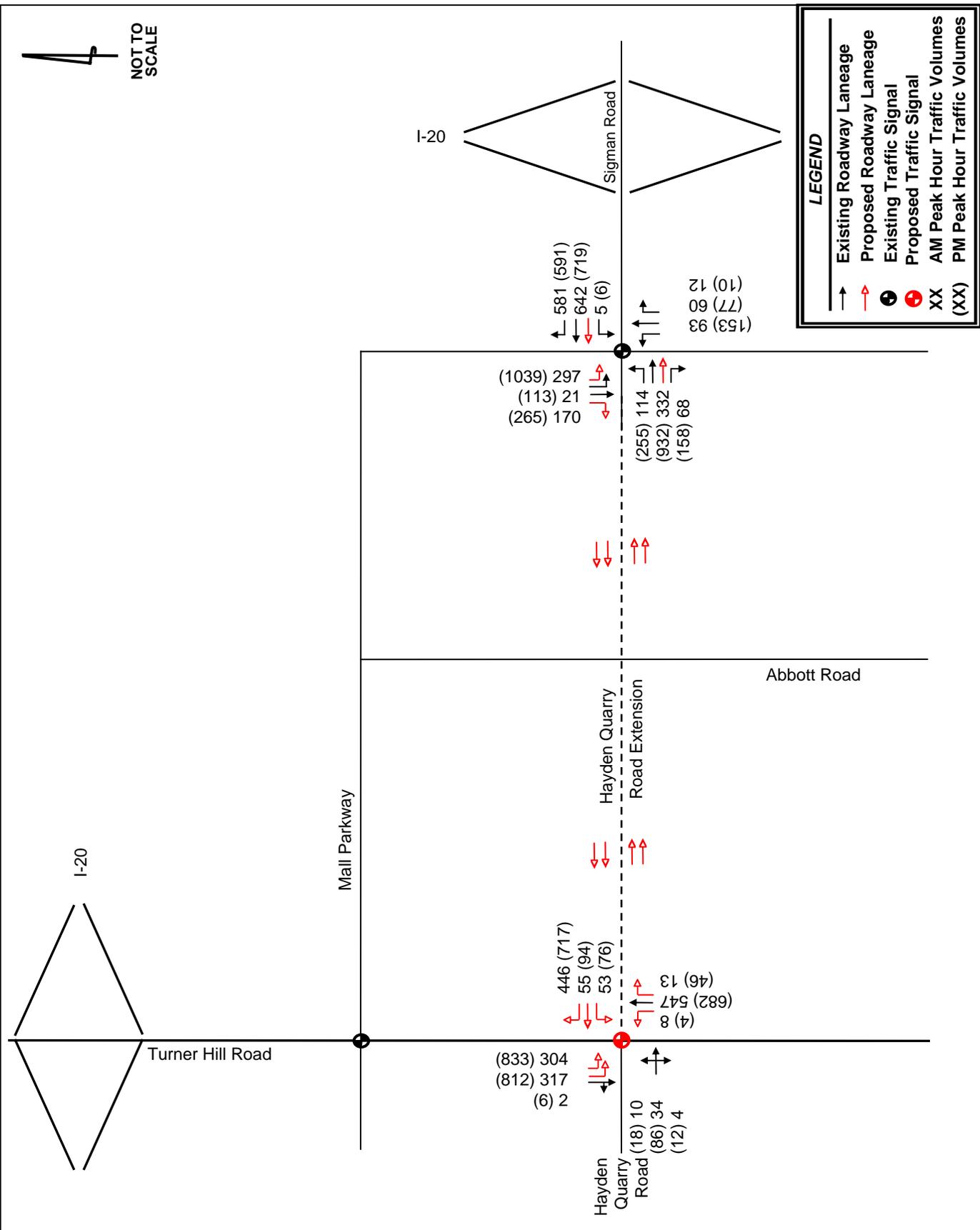
Level of service determinations were made for the design year 2029 AM and PM peak hour traffic conditions for the Hayden Quarry Road Extension/Turner Hill Road intersection and Hayden Quarry Road Extension/Iris Drive intersection with the intersection signalization and laneage recommendations incorporated. **Table 1** summarizes the levels of service and delay in seconds (per vehicle) for the two intersections under design year 2029 traffic conditions. The Hayden Quarry Road Extension/Turner Hill Road intersection is projected to operate LOS B during the AM peak period and LOS C during the



NOT TO SCALE

LEGEND

- Existing Roadway Laneage
- Proposed Roadway Laneage
- Existing Traffic Signal
- Proposed Traffic Signal
- AM Peak Hour Traffic Volumes
- PM Peak Hour Traffic Volumes



PM peak period. The Hayden Quarry Road Extension/Iris Drive intersection is projected to operate at LOS C during the AM peak period and LOS D during the PM peak period.

Table 1 Level of Service Summary, Design Year 2029 Signalized Intersections		
Intersection	Overall LOS (Delay in Seconds)	
	AM Peak	PM Peak
Hayden Quarry Road Extension/Turner Hill Road	B (15.8)	C (26.6)
Hayden Quarry Road Extension/Iris Drive	C (22.0)	D (39.4)

Copies of the *Synchro* capacity analysis reports are available in the Appendix.

4.0 CONCLUSION

Hayden Quarry Road Extension is projected to be completed in 2009 and will extend Hayden Quarry Road approximately 1.5 miles to the east, from Turner Hill Road to Iris Drive. Traffic counts were collected at eight intersections in the vicinity of the proposed extension to establish existing 2005 traffic conditions and patterns. A percentage of volume along Iris Drive was relocated to the proposed Hayden Quarry Road Extension based on an analysis of the existing turning movement counts. Development plans for the area were reviewed and traffic projections were made. Trips associated with expected future development were added to the roadway network (with adjusted existing volumes) to obtain design year 2029 volumes. This report analyzed the intersections of Hayden Quarry Road Extension/Turner Hill Road and Hayden Quarry Road Extension/Iris Drive as well as the proposed Hayden Quarry Road Extension under design year 2029 traffic conditions. Recommended laneage incorporated in the analyses at the intersections and along Hayden Quarry Road Extension was based upon achieving LOS D or better during the design year 2029 traffic conditions.

4.1 General Recommendations

Based on the design year 2029 traffic conditions, we offer the following:

Hayden Quarry Road Extension

- The roadway should be designed as a four-lane divided roadway from Turner Hill Road to Iris Drive.

- The outside westbound through lane approaching Turner Hill Road should transition into the westbound free-flow right-turn lane, leaving one westbound through lane at the Hayden Quarry Road Extension/Turner Hill Road intersection.

Turner Hill Road

- Should be widened to a four-lane divided facility from its intersection with Mall Parkway to Hayden Quarry Road Extension

Hayden Quarry Road Extension/Turner Hill Road Intersection

- A traffic signal should be installed at the intersection.
- A single-lane (shared left-turn/through/right-turn lane) eastbound approach
- A three-lane (exclusive left-turn lane, through lane, and free-flow right-turn lane) westbound approach
- A three lane (shared left-turn/through/right-turn lane) northbound approach
- A three-lane (dual left-turn lanes and a shared through/right-turn lane) southbound approach

Hayden Quarry Road Extension/Iris Drive Intersection

- The intersection should be designed as a signalized intersection.
- A four-lane (exclusive left-turn lane, two through lanes, and an exclusive right-turn lane) eastbound approach
- A four-lane (exclusive left-turn lane, two through lanes, and an exclusive right-turn lane) westbound approach
- A three-lane (exclusive left-turn lane, through lane, and free-flow right-turn lane) northbound approach
- A four-lane (dual left-turn lanes, single through lane, and exclusive right-turn lane) southbound approach
- Relocate the intersection approximately 300' to the west to achieve a minimum of 660' from the I-20 eastbound ramps.

INITIAL CONCEPT MEETING

October 26, 2005

Hayden Quarry Road/Sigman Road Extension
P.I. No. 0006888 & 0006931
DeKalb and Rockdale Counties

A meeting was held at the DeKalb County Transportation Conference Room to discuss the referenced project. The following persons were in attendance:

John Gurbal	DeKalb County
Patrece Keeter	DeKalb County
David Pelton	DeKalb County
Charles McGiboney	Rockdale County
Taylor Wright	PBS&J
Nikki Reutlinger	PBS&J
Bill Pate	Kimley-Horn and Associates
Bryon Letourneau	Kimley-Horn and Associates

This project consists of a new alignment roadway approximately from the existing Hayden Quarry Road and Turner Hill Road intersection in DeKalb County eastward for about 2 miles into Rockdale County connecting to Sigman Road near the interchange of I-20 and Sigman Road. This meeting was held as an Initial Concept Meeting to discuss some alternatives for the alignment of the new road.

1. There was a lengthy discussion between John Gurbal and Charles McGiboney on exactly how and when this project would be funded. They decided to go to GDOT to get their input on the project and discuss funding options.
2. PBS&J agreed to set up the meeting with GDOT once the environmental screening has been completed.
3. Kimley-Horn and Associates (KHA) will get the environmentalists out ASAP.
4. Charles McGiboney agreed to take the layouts prepared by KHA and speak to his County Commission Chairman to make him aware of DeKalb's progress with this project.
5. Charles also made everyone aware that currently the Rockdale County Citizens Advisory Committee for the prioritization of SPLOST projects was in the process of creating their priority list of projects and this project was not currently very high on the list. He did not know exactly why, but he did not feel the public disliked the project.
6. The layouts presented were generally accepted by those present and would need to be tweaked as we move the concept development.
7. The Right-of-Way shown in the existing Hayden Quarry Road area will be cleaned up to show the latest Right-of-Way in the area.
8. The crossing of Honey Creek was agreed upon and KHA was asked to get the Hydraulic Survey started and begin work on the Hydraulic Study to size the road crossing of the creek.

9. KHA will also move forward on the Traffic Study for the project.
10. Charles McGibboney left a copy of a public display that the County had presented to the public approximately a year ago. This map showed a preliminary alignment pretty similar to the current proposed alignments and showed the existing property lines in Rockdale County.

This is Kimley-Horn and Associates understanding of events that occurred at this meeting. If there are any changes, corrections, or additions required please contact Bryon Letourneau at 770-825-0074 or Bryon.Letourneau@Kimley-Horn.com as soon as possible.

CONCEPT TEAM MEETING

June 27, 2006

Hayden Quarry Road/Sigman Road Extension
P.I. No. 0006888 & 0006931
DeKalb and Rockdale Counties

A meeting was held at the GDOT District 7 Office Conference Room to discuss the referenced project. The following persons were in attendance:

Ralph Merrow, Jr.	GDOT – District 7
Mike Lobdell	GDOT – District 7
Ted Crabtree	GDOT – District 7
Scott Lee	GDOT – District 7
Chris Woods	GDOT – District 7
Lee Upkins	GDOT - Utilities
Nassar Raad	GDOT – OTS&D
Patrece Keeter	DeKalb County
Taylor Wright	PBS&J
Steven Lindsey	PBS&J
Nikki Reutlinger	PBS&J
Mark Kilby	Kimley-Horn and Associates
Bryon Letourneau	Kimley-Horn and Associates
Natalie Stuetzer	Kimley-Horn and Associates

This project consists of a new alignment roadway with some widening from just west of the existing Hayden Quarry Road and Turner Hill Road intersection in DeKalb County eastward for about 2 miles into Rockdale County connecting to Sigman Road near the interchange of I-20 and Sigman Road. This meeting was held to discuss the concept report.

1. Bryon Letourneau gave an overview of the project.
2. The Need and Purpose Statement needs to address modeling, ARC number, level of service, and lane use. It also needs to explain why this project is needed.
3. Accident history needs to be obtained and mentioned in the Need and Purpose.
4. In the description of the project, mention the 2 signals. One signal is new and the other is relocation. Also mention the landscaping and lighting in the description.
5. In the Proposed Design Features, the “Maximum radius allowable” should read “Minimum radius allowable”.
6. The Initial Concept Meeting Minutes should be dated February 28, 2006. These minutes should be attached to the Concept Report.
7. We should anticipate an individual permit; therefore, a PAR is required.
8. A public information open house (PIOH) will need to be held but a PAR meeting and a meeting with FHWA should be scheduled before the PIOH.
9. A public hearing as well as a PIOH will be needed for this project.

Initial Concept Meeting with GDOT – District 7

February 28, 2006

Hayden Quarry Road/Sigman Road Extension

P.I. No. 0006888 & 0006931

DeKalb and Rockdale Counties

A meeting was held at the District 7 conference room to discuss the referenced project. The following persons were in attendance:

Mike Lobdell	GDOT - District 7
Ralph Merrow	GDOT - District 7
Jerrell Thomson	GDOT - District 7
Mike Coleman	GDOT - District 7
Marshall Troup	GDOT - District 7
Edlin Regis	GDOT - District 7
David Pelton	DeKalb County
Shannon Hebb	Rockdale County
Taylor Wright	PBS&J
Nikki Reutlinger	PBS&J
Mark Kilby	Kimley-Horn and Associates
Bryon Letourneau	Kimley-Horn and Associates

This project consists of a new alignment roadway approximately from the existing Hayden Quarry Road and Turner Hill Road intersection in DeKalb County eastward for about 2 miles into Rockdale County connecting to Sigman Road near the interchange of I-20 and Sigman Road. This meeting was held to discuss proposed concept.

1. Bryon Letourneau described the project on the alternatives layout. Explaining how the preferred alternative was determined.
2. This project has been shown to the Rockdale County public at a public meeting held a few years ago.
3. GDOT personnel suggested it would be a good idea to talk to the large landowners involved in the projects outside of the planned PIOH.
4. GDOT felt the concept at this early stage looked acceptable and that they look forward to reviewing the Concept Report.

This is Kimley-Horn and Associates understanding of events that occurred at this meeting. If there are any changes, corrections, or additions required please contact Bryon Letourneau at 770-825-0074 or Bryon.Letourneau@Kimley-Horn.com as soon as possible.

10. The time to complete the environmental process may take longer than 12 months, especially if an individual permit is required.
11. A developer donated right of way to DeKalb County, so there will probably be no required right of way in DeKalb County.
12. No PMA is filed with GDOT for DeKalb County. Patrece Keeter will check on the status of the PMA
13. PMA was received from Rockdale County.
14. It was suggested to use \$90-115/TN for asphalt quantities.
15. Remove the appendix for the Traffic Study when it is attached to the Concept Report.

This is Kimley-Horn and Associates understanding of events that occurred at this meeting. If there are any changes, corrections, or additions required please contact Bryon Letourneau at 770-825-0074 or Bryon.Letourneau@Kimley-Horn.com as soon as possible.

