CENTRAL TEXAS
Regional Mobility Authority

AGENDA ITEM #5 SUMMARY

Approve a supplement to the work authorization with Jacobs Engineering Group Inc. for preliminary engineering and environmental services for the MoPac South Project.

Strategic Plan Relevance: Regional Mobility

Department: Engineering

Associated Costs: $460,922 (not to exceed)

Funding Source: General Fund, Reimbursed through an Advanced Funding Agreement with Texas Department of Transportation

Board Action Required: Yes

Description of Matter:

The Board authorized the Executive Director to execute a contract with Jacobs Engineering Group Inc. ("Jacobs") to provide preliminary engineering and environmental services for the MoPac South Project and MoPac South Intersections Project at its March 27, 2013 meeting. In April 2015, it was determined that a fourth Open House was necessary to address public concerns and to allow time to evaluate additional concepts and impacts to downtown street system related to the addition of lanes on MoPac. This proposed supplement to the work authorization continues Jacob's support of current activities and the inclusion of additional activities related to the MoPac South project. These activities include: alternatives development and evaluation, environmental studies, public involvement, preliminary engineering, hydraulic studies, and schematic development.

Reference: Draft Supplement No. 2 to Work Authorization No. 1
Draft Resolution

Contact: Wesley M. Burford, P.E., Director of Engineering

EXHIBIT B
SERVICES TO BE PROVIDED BY THE ENGINEER

I. INTRODUCTION

The Central Texas Regional Mobility Authority (Mobility Authority) and Jacobs Engineering Inc. (ENGINEER) entered into a Contract for Engineering Services on April 17, 2013, the Scope of Services for which included the MoPac South Project. The Project, authorized under Work Authorization #1, generally consists of alternatives development and evaluation, environmental studies, public involvement, preliminary engineering, design, field survey, hydraulic studies, and schematic development for the Mobility Authority's proposed MoPac South project, subsequently termed the Mopac South Environmental Study, from Cesar Chavez Street to Slaughter Lane, located in Travis County, Texas.

In response to community feedback for additional public involvement, the Mobility Authority is extending the timeframe for the environmental study to allow for additional community involvement and engineering analysis. This Supplemental Work Authorization #2 to Work Authorization #1 provides for the additional tasks and effort related to the Mobility Authority's desire for additional public involvement and engineering analysis.

II. PROJECT MANAGEMENT AND ADMINISTRATION

For an additional five (5) months, the ENGINEER will perform project administration and coordination duties, including contract administration, project management, meeting minutes of all meetings and telephone conversations, and other related administrative tasks associated with the Project, including:

A. PROJECT MANAGEMENT AND ADMINISTRATION

Task 1: Progress Reports and Invoices

The ENGINEER will continue to prepare monthly invoices and progress reports for the work tasks and provide evidence of work accomplished during the time period since the previous report. Monthly progress reports will be submitted and will include: activities completed, initiated, or ongoing during the reporting period; activities planned for the coming period; problems encountered and actions to remedy them; overall status, including a tabulation of percentage complete by task; and updated project schedules.

Task 2: Record Keeping and File Management

The ENGINEER will continue to maintain all records and files related to the project throughout the duration of the services. See Section on **Submittals and Deliverables** for additional information.

Task 3: Correspondence

For the Project, continue to prepare written materials, letters, survey forms etc. used to solicit information or collect data for the project and submit them to the Mobility Authority for review and approval prior to use or distribution. A letter of transmittal will accompany each document

submittal to the Mobility Authority. At a minimum, the letter of transmittal will include the Project Name, State CSJ number, County, and project limits.

Task 4: Schedule

For the Project, continue to prepare a detailed, graphic schedule linking Work Authorization tasks, subtasks, critical dates, milestones, deliverables and the required reviews using the latest version of Primavera [the Mobility Authority General Engineering Consultant (GEC) will utilize Primavera P6 for project master schedule] software in accordance with the State's Administrative Circular No. 17-93. The project schedule will be in a format, which depicts the order and inter-dependence of the various tasks, subtasks, milestones, and deliverables for each of the tasks identified therein. Progress will be reviewed monthly for conformance to the contracted work schedule and should these reviews indicate a substantial change in progress, a recovery plan will be developed by the ENGINEER and provided to the Mobility Authority.

B. COORDINATION

The ENGINEER will attend up to ten (10) additional progress/coordination meetings with the Mobility Authority. In preparation for each meeting, the ENGINEER will prepare and distribute a Meeting Agenda which will include a brief description of the meeting objectives, a list of the topics to be covered and who will facilitate the discussion of each topic.

C. QUALITY ASSURANCE/QUALITY CONTROL (QA/QC)

The ENGINEER will continue to provide quality assurance and quality control (QA/QC) in accordance with the QA/QC plan.

D. SUBMITTALS AND DELIVERABLES

The ENGINEER will continue to deliver each submittal in accordance with the milestones shown in the contracted Work Schedule.

Deliverables

- Five (5) additional monthly invoices and progress reports
- Five (5) additional monthly schedule updates
- Attendance at ten (10) additional coordination meetings

III. MOPAC SOUTH ENVIRONMENTAL STUDY

A. ROUTE AND DESIGN STUDIES

Task 4: Design Schematics

Development and Evaluation of Operational Configurations
The ENGINEER will develop and evaluate operational configurations for refining the current Recommended Reasonable Alternative. The following operational configurations will be analyzed:

- 1a: One express lane in each direction with DCs to Cesar Chavez
- 1b: One express lane in each direction without DCs to/from Cesar Chavez (traffic weaves across general purpose lanes)
- 2a: Two express lanes in each direction with DCs to/from Cesar Chavez
- 2b: Two express lanes without DC ramps to Cesar Chavez (traffic weaves across general purpose lanes)
- 2c: Two express lanes with wishbone ramps to right lane of general purpose and added GP auxiliary lane
- 2d: Two express lanes with drop down to Lake Austin and DC from Cesar Chavez

The ENGINEER will also evaluate the feasibility of the City of Austin provided concept. The evaluation will involve developing horizontal and vertical alignments for the following:

- Bee Cave Road ramp fly over to west side of frontage road
- 2-Lane collector-distributor system from approximately Loop 360 to Cesar Chavez
- 2-Lane express lane direct connection between EB US 290 and NB MoPac
- 2-Lane express lanes for MoPac south of US 290
- Alternative for a wishbone north of US 290
- Slip ramps and braided ramps based on the line diagram provided

For the City of Austin provided concept, the ENGINEER will evaluate access into and out of the express lanes and develop representative typical sections at key locations to convey the concept. In addition, the ENGINEER will develop a basic cross section template for the collector distributor to assess the feasibility of the City's concept. No superelevation shaping will be included with the cross section development. The ENGINEER will participate in up to four (4) meetings with the City of Austin (with the Mobility Authority/GEC).

The ENGINEER will prepare line drawings and typical sections for use by the Mobility Authority's traffic engineering consultants and to convey the configurations to the general public. For each concept, the ENGINEER will develop high level, preliminary cost estimates. In collaboration with the Mobility Authority's consultants the ENGINEER will also characterize the operational configurations within the framework of the project's previously stated goals and objectives, focusing on operational and environmental impacts.

The ENGINEER will also update the alternatives analysis technical memorandum to document the consideration of operational configurations and any refinements to the Recommended Reasonable Alternative. The consideration of operational configurations and refinement of the Recommended Reasonable Alternative is assumed to result in a single Build Alternative for analysis in the Environmental Assessment. Supplemental scope and budget would be required for any additional Build Alternative(s).

Deliverables

- Line diagrams and typical sections of the operational configurations
- Characteristics of each operational configuration in terms of project goals and objectives
- Updated alternatives analysis technical memorandum

Design Schematics
The ENGINEER will revise the geometric design of the Recommended Reasonable Alternative in response to the analysis of operational configurations and make all necessary horizontal and vertical alignments.

Geotechnical Investigation [Requires a Separate, Written Notice-To-Proceed]
The ENGINEER will also conduct a geotechnical investigation in two locations: 1) under the existing Mopac South bridge over Barton Creek, and 2) at the Gaines Sink area (MoPac South at US 290) where a new bridge is planned. In both locations, borings will be drilled at proposed column or bent supports. The purpose of the geotechnical investigation is to determine subsurface soil and rock conditions, determine if there are any karst features (voids) in the footprint of the proposed bridge foundations, obtain samples for laboratory testing and provide preliminary foundation recommendations for the bridge supports. A more complete description of this effort is provided in the attachment to Exhibit B. This effort assumes that 1) all activities are conducted within the existing MoPac South right-of-way, 2) the activities are allowed under a USACE NWP 6, and 3) any clearing within the ROW would occur outside GCWA nesting season (March 1 - September 1). Drilling procedures will generally follow the "*Guidelines for Karst Protection for Work within the BCP Infrastructure Corridor*."

Deliverables

- Revised geometric design of the Recommended Reasonable Alternative
- Geotechnical Investigation Engineering Report (draft and final)

Task 6: Traffic Engineering Studies
The ENGINEER will conduct additional coordination with the Mobility Authority's traffic consultants for the evaluation of optional configurations, including supporting information related to geometry and access points. This includes provide traffic pattern diagrams and Microstation files.

Traffic Simulation Model Development
The ENGINEER will develop microscopic traffic simulation models for the MoPac South and Cesar Chavez Street area in the VISSIM software package. The VISSIM models for the MoPac and Cesar Chavez corridors will include main lanes, ramps, frontage roads and intersections. The ENGINEER will use City of Austin signal timings for the Veteran's Drive at Lake Austin Boulevard and Atlanta Street at Lake Austin Boulevard intersections to input into Synchro and will code the Synchro timings into VISSIM models. VISSIM will be modeled for the AM peak hour and PM peak hour for the existing, future no-build, and two future build scenarios (year 2020). Both the existing configuration and future configurations will include the MoPac South express lanes. The future build scenarios will be a) two express lanes in each direction with direct connectors to Cesar Chavez, and b) two express lanes in each direction without direct connectors to Cesar Chavez. Both future build scenarios will include the proposed Pressler Street extension.

The ENGINEER will conduct all field surveys and measurements (e.g. lane configuration, speed and travel time, etc.) for the calibration of the traffic simulation model.

The ENGINEER will use the traffic volumes based on data provided by the Mobility Authority's traffic consultants. The ENGINEER will obtain projected daily traffic volumes and peak hour volumes for the future scenarios using data supplied by the Mobility Authority's consultants. The peak hour

demands will be coded in the microscopic simulation model as static routes. This task will not include the application of the dynamic traffic assignment module.

Default VISSIM variables for the car-following and lane-changing models will be modified as deemed appropriate by the ENGINEER.

All the developed simulation models will include 15-minute pre-load period. Therefore, the total modeling period will be equal to 1 hour and 15 minutes. This task would include the validation and/or calibration of the simulation model under existing conditions.

The MOEs generated as part of this task will be the average values of ten (10) simulation runs with different seed values for each analysis scenario. The ENGINEER will report the v/c ratio and average delay MOEs.

Following completion of the microscopic traffic simulation in the study corridor for scenarios, the ENGINEER will conduct a meeting to review the results of the simulation with the Mobility Authority.

The ENGINEER shall develop computer model visualization, using VISSIM with the intent of integrating into 3DS-Max, in consultation and with the approval of the Mobility Authority. The ENGINEER shall produce a visual simulation (animated windows media file in 720P resolution) for up to eight (8) video clips (both peak hours per scenario). Each scenario shall be approximately 60 seconds in length. Total animation shall be approximately eight minutes in length. The animation files will be developed in Audio Video Interleave (.AVI) format to be used as presentation material. This does not include the insertion of some 3-D elements in the background of the simulation models, such as existing natural features or buildings.

The simulation model input and output files will be provided to the Mobility Authority upon completion.

Deliverables

- Traffic pattern diagrams
- Attendance at meetings (assume 40 meetings)
- Meeting summaries
- Traffic Simulation Model Development
    - Develop Intersection Signal Timing & Phasing Plan (AM & PM peaks)
    - Develop VISSIM Model Networks (AM & PM peaks)
    - Calibrate VISSIM Traffic Models
    - Analyze Existing Peak Hour Conditions - Deficiencies and Improvements (AM & PM peaks)
    - Analyze No-Build Scenario (AM & PM peaks)
    - Analyze Future Improvement Scenarios (AM & PM peaks)
    - Develop Evaluation Matrix and Evaluate Alternatives
    - Develop Measures of Effectiveness (MOEs)
    - Develop Computer Animation Visualization
    - Prepare Traffic Operations Memorandum (draft and final)

B. SOCIAL, ECONOMIC AND ENVIRONMENTAL STUDIES AND PUBLIC INVOLVEMENT

Task 2: Environmental Process Initiation

Subtask D: Purpose and Need Statement
The ENGINEER will update the Draft Purpose and Need Statement for consistency with the CAMPO 2040 Regional Transportation Plan (RTP).

Task 3: Data Collection/Existing Conditions/Environmental Analysis

Subtask F: Air Quality Analysis
The ENGINEER will update the MSATs technical memorandum for consistency with the CAMPO 2040 RTP.

Subtask G: Traffic Noise Analysis
The ENGINEER will update the technical memorandum on noise impacts for consistency with changes to the Recommended Reasonable Alternative design.

Subtask H: Water Quality Studies
The ENGINEER will update the technical memorandum on water quality and drainage for consistency with changes to the Recommended Reasonable Alternative design.

Subtask I: U.S. Army Corps of Engineers Permits/Waters of the U.S.
The ENGINEER will update the technical memorandum on water resources for consistency with changes to the Recommended Reasonable Alternative design.

Subtask P: Threatened or Endangered Species
The ENGINEER will update the Biological Evaluation for consistency with changes to the Recommended Reasonable Alternative design.

Subtask R: Historic Resource Studies
The ENGINEER will update the technical memorandum on historic resources for consistency with changes to the Recommended Reasonable Alternative design.

Subtask T: Visual Impacts
The ENGINEER will update the technical memorandum on visual impacts for consistency with changes to the Recommended Reasonable Alternative design.

Subtask U: Indirect Impacts
The ENGINEER will update the technical memorandum on indirect impacts for consistency with the CAMPO 2040 RTP.

Subtask V: Cumulative Impacts
The ENGINEER will update the technical memorandum on cumulative impacts for consistency with the CAMPO 2040 RTP.

Deliverables

- Revised Purpose & Need Statement
- Revised technical memorandum on MSATS
- Revised technical memorandum on traffic noise
- Revised technical memorandum on water quality and drainage
- Revised technical memorandum on water resources
- Revised technical Biological Evaluation
- Revised technical memorandum on historic resources
- Revised technical memorandum on visual impacts
- Revised technical memorandum on indirect and cumulative impacts

Task 6: Public Involvement

The ENGINEER will perform public involvement activities in accordance with 43 TAC 2.40 – 2.50 as well as with the current version of TxDOT's environmental procedures manual.

Subtask A: Public Involvement Plan

The ENGINEER will revise the public involvement plan to facilitate meaningful participation to ascertain stakeholder input on initiatives to promote environmental stewardship and sustainability planning as part of the environmental decision-making process. The updated public involvement plan would be submitted to the Mobility Authority for review and approval. The ENGINEER will also attend monthly meetings of the Mobility Authority's public involvement (PI) team.

Deliverables

- Updated Public Involvement Plan
- Attend PI team meetings (assume five meetings)

Subtask B: Stakeholder Engagement

a. The ENGINEER will maintain and update a **Mailing List** of people, agencies and organizations interested in the proposed project. The Mobility Authority will provide the ENGINEER with relevant data available to the Mobility Authority.

b. The ENGINEER will provide content for inclusion on a **Project Website** or Public Engagement forum. Content could include, but not be limited to:
    1. Project description information
    2. Upcoming events and activities
    3. Project Reports and documentation
    4. Project newsletters and fact sheets
    5. Frequently Asked Questions
    6. Links to related websites
    7. Public engagement forum questions and responses

c. The ENGINEER will assist in the development of eight (8) electronic **Project Newsletters**. The newsletter will incorporate factual project-related articles, text and graphics as instructed and/or approved by the Mobility Authority, TxDOT and project team. The project newsletters will be used to provide project information updates and announce upcoming meetings and events. Project newsletters will be distributed via email. Graphic design, layout and email distribution will be handled by the Mobility Authority (GEC).

d. The ENGINEER will prepare **Fact Sheets** to provide more in depth information on special project topics than can be provided in the project newsletter (e.g. explanation of operational configurations, environmental impacts and mitigation measures, etc.). The fact sheets will be no longer than two (2) two-sided pages with appropriate graphics. Graphic design and layout will be provided by the Mobility Authority (GEC). The ENGINEER will mail fact sheets to community members upon request. The ENGINEER will also make the fact sheets available in PDF format on the project website and at public involvement activities including neighborhood and public meetings and project presentations.

e. The ENGINEER will assist with preparation of **FAQs**, with responses, for approval by the Mobility Authority, TxDOT Austin District, TxDOT—ENV and posting on the project website.

f. The ENGINEER will draft, print and distribute two (2) **Direct Mail pieces** (1-page, 2-sided, color, card stock) up to 20,000 physical addresses. The ENGINEER will purchase a precinct database for distribution.

g. The ENGINEER will assist with the development of (3) **Informational Videos**. The ENGINEER will provide assistance with subject matter; develop a script/questions/format; participate in preparation sessions; and provide technical staff as needed. The ENGINEER will create these informational videos in collaboration with other Mobility Authority resources (GEC).

h. The ENGINEER will assist with the development of one (1) **Informational Advertising** piece. The ENGINEER will develop content, layout and graphic design for paid ad placement (1/2 page each) in Community Impact SW, Community Impact Westlake and Community Impact Central. The ENGINEER will create these informational advertisements in collaboration with other Mobility Authority resources (GEC).

i. The ENGINEER, in collaboration with the Mobility Authority (GEC), will make all arrangements for three (3) **Stakeholder Workshops**. The workshops will be coordinated and held in accordance with the following:

    1. The Mobility Authority/GEC will coordinate workshop meeting locations, dates and times.
    2. The ENGINEER will prepare workshop exhibits.
    3. The ENGINEER will revise all workshop materials as needed and obtain the Mobility Authority's approval on all materials prior to use at the workshops.
    4. The ENGINEER will participate in pre-meetings with the Mobility Authority and TxDOT to review all materials to be used at workshops.
    5. The ENGINEER will provide personnel for the workshops to make presentations and answer questions.
    6. The ENGINEER will develop and submit to the Mobility Authority draft and final summary notes and sign-in sheets for each workshop.

j. The ENGINEER will conduct up to twenty (20) **Stakeholder Meetings** to discuss the MoPac South Environmental Study. This effort includes maintaining a list of potential community members (neighborhood associations, special interest groups, business associations, etc.) to contact for informal meetings/discussions and send project information to community groups and offers to

meet with them. The ENGINEER will also respond to requests from community members for meetings with project staff, and coordinate with the Mobility Authority and TXDOT on meeting logistics. The ENGINEER will maintain a complete correspondence file for the stakeholder meetings, including printed and electronic letters and other correspondence, and prepare a summary for each meeting held.

k. The ENGINEER will make all arrangements for one (1) public meeting, **Open House #4**. This meeting will be coordinated and held in accordance with the following:
    1. The ENGINEER will secure the **meeting location**, date and time (includes securing a/v equipment, chairs/tables, podium, etc.) In the interest of the community outreach and cost, the ENGINEER should ideally pursue non-commercial, community sites for the Public Meeting when possible.
    2. The ENGINEER will prepare **display advertisements** for the meeting. The ENGINEER will prepare and distribute meeting notices for distribution to the contacts on project databases. The ENGINEER will provide the Mobility Authority draft copies of display ads at least three (3) weeks prior to first publication date. Graphic design and layout will be provided by the Mobility Authority (GEC).
    3. The ENGINEER will prepare **meeting handouts**, agendas, name tags, sign-in sheets, speaker cards, and comment cards. The ENGINEER will prepare **conceptual layouts and exhibit boards** for the meeting.
    4. The ENGINEER will provide a **translator (if needed)**, audio/video equipment (projector, screen, microphones, podium, etc.) (if needed).
    5. The ENGINEER will provide a **court reporter** at the Public Meeting.
    6. The ENGINEER will compile and prepare **responses to comments** received during the Open House #4 public comment period.
    7. The ENGINEER will make up to two (2) rounds of revisions on all meeting materials. The ENGINEER will obtain the Mobility Authority's approval on all materials prior to production or publication.
    8. The ENGINEER will arrange up to two (2) **pre-meetings** (a pre-meeting prior to the public meeting) with the Mobility Authority and TxDOT to review all exhibits and other materials to be used at public meetings.
    9. The ENGINEER will provide **meeting personnel** including three (3) public involvement and coordination staff to perform registration, make presentations, and answer questions.
    10. The ENGINEER will develop and submit to the Mobility Authority one (1) Public Meeting Summary Report that documents the activities of the meeting conducted. The report will contain the outreach, notifications, and contacts conducted prior to the meeting; meeting details such as presentations, attendance, and pertinent details regarding the meeting; and a comment and response section that documents comments received before, during and after the meeting, and a response to each. The Public Meeting Summary Report will be sufficiently detailed to provide a full record of officially submitted comments from the meeting.

Deliverables

- Updated project database/mailing list
- Website content
- Eight (8) electronic Project Newsletters
- Two (2) Fact Sheets
- Two (2) Frequently Asked Questions (FAQs) updates
- Two (2) Direct Mail pieces
- Attendance at monthly PI team meetings
- Three (3) Informational Videos
- Six (6) Informational Advertising pieces
- Three (3) Stakeholder Workshop summaries
- Up to twenty (20) Stakeholder Meeting summaries
- Logistical support, materials and exhibits for public meeting, community workshops and stakeholder meetings
- One (1) Public Meeting Summary Report

D. DRAINAGE & WATER QUALITY

Task 4: Water Quality

The ENGINEER will prepare a technical memorandum summarizing the risk to sensitive environmental features and resources posed by the proposed improvements to Mopac South. The memorandum will evaluate the potential for a significant hydrogeological connection between the project area and known area caves that could affect water quality, quantity, and protected species.

Deliverables

- Risk assessment technical memorandum (draft and final)

JACOBS

EXHIBIT D FEE SCHEDULE

Work Authorization #1, Supplemental Work Authorization #2

Final: 23-Jul-15

Work Authorization #1		Contract Maximum			Expended through June 2015			Balance Remaining			Estimate to Complete			Savings	Notes
Firm	Description of Work	Labor	ODE	Total	Labor	ODE	Total	Labor	ODE	Total	Labor	ODE	Total	Total	Primary Source(s) of Savings
Jacobs	Project Management, Design, Environmental Documentation, Support Services and Public Involvement	$ 2,787,581	$ 278,684	$ 3,066,265	$ 2,155,179	$ 15,801	$ 2,170,980	$ 632,402	$ 262,883	$ 895,285	$ 657,882	$ 20,530	$ 678,412	$ 216,873	One printed, mailed newsletter instead of ten; Efficient execution of TMs and EA
Michael Barrett, PhD.	Water Quality	$ 117,900	$ -	$ 117,900	$ 22,320	$ -	$ 22,320	$ 95,580	$ -	$ 95,580	$ 65,000	$ -	$ 65,000	$ 30,580	Emphasis on advisory role instead of design support
Don Martin Public Affairs	Public Involvement and Community Engagement	$ 66,600	$ 1,187	$ 67,787	$ 4,874	$ 937	$ 5,811	$ 61,726	$ 250	$ 61,976	$ 10,000	$ 250	$ 10,250	$ 51,726	PI support coming primarily from other resources
Group Solutions RJW	Public Involvement and Community Engagement	$ 270,717	$ 74,008	$ 344,725	$ 238,349	$ 29,891	$ 268,240	$ 32,368	$ 44,117	$ 76,485	$ 66,485	$ 10,000	$ 76,485	$ (0)	
Hicks & Company	Environmental Studies and Documentation	$ 307,384	$ 2,955	$ 310,339	$ 306,096	$ 83	$ 306,179	$ 1,287	$ 2,872	$ 4,160	$ 1,287	$ 2,872	$ 4,160	$ -	
K Friese & Associates	Drainage Design and Water Quality	$ 287,041	$ -	$ 287,041	$ 227,149	$ -	$ 227,149	$ 59,892	$ -	$ 59,892	$ 59,892	$ -	$ 59,892	$ -	
SAM Inc.	Aerial Mapping and Surveying	$ 126,195	$ 47,651	$ 173,846	$ 146,965	$ 21,930	$ 168,895	$ (20,770)	$ 25,721	$ 4,952	$ -	$ -	$ -	$ 4,952	Less than anticipated ODE
LBJ Wildflower Center	Soils & Vegetation	$ 162,655	$ 613	$ 163,268	$ 47,261	$ -	$ 47,261	$ 115,395	$ 613	$ 116,008	$ 10,000	$ -	$ 10,000	$ 106,008	Efficient scope execution
Zara Environmental	Environmental Studies and Documentation	$ 302,944	$ 11,874	$ 314,818	$ 194,177	$ 2,097	$ 196,274	$ 108,767	$ 9,777	$ 118,544	$ 20,000	$ 2,000	$ 22,000	$ 96,544	Survey area limited to existing ROW
	Total	**$ 4,429,017**	**$ 416,972**	**$ 4,845,989**	**$ 3,342,370**	**$ 70,739**	**$ 3,413,109**	**$ 1,086,647**	**$ 346,233**	**$ 1,432,880**	**$ 890,546**	**$ 35,652**	**$ 926,198**	**$ 506,682**	

WA #1 Summary		
	Maximum	$ 4,845,989
	Expended	$ 3,413,109
	Estimate to Complete	$ 926,198
	Estimate at Complete	$ 4,339,307
	Estimated Savings	$ 506,682

Supplemental Work Authorization #2 Fee Estimate					Adjusted SWA #2 Fee Estimate						Notes
Firm	Description of Work	Labor	ODE	Total	Labor	ODE	Total	Percent of Total	DBE Total	Percent DBE	
Jacobs	Project Management, Design, Environmental Documentation, Support Services and Public Involvement	$ 578,355	$ 32,000	$ 610,355	$ 603,835	$ (210,353)	$ 393,482	63%	$ -	0%	
Michael Barrett, PhD.	Water Quality	$ 13,680	$ -	$ 13,680	$ (16,900)	$ -	$ (16,900)	1%	$ -	0%	
Don Martin Public Affairs	Public Involvement and Community Engagement	$ -	$ -	$ -	$ (51,726)	$ -	$ (51,726)	0%	$ -	0%	
Group Solutions RJW	Public Involvement and Community Engagement	$ 108,932	$ 45,528	$ 154,460	$ 143,049	$ 11,411	$ 154,460	16%	$ 154,460	16%	
Hicks & Company	Environmental Studies and Documentation	$ 23,262	$ -	$ 23,262	$ 23,262	$ -	$ 23,262	2%	$ 23,262	2%	
Holt Engineering	Geotechnical Investigation	$ 31,530	$ 75,282	$ 106,812	$ 31,530	$ 75,282	$ 106,812	11%	$ 106,812	11%	**Requires separate, written notice to proceed**
K Friese & Associates	Drainage Design and Water Quality	$ 33,374	$ 191	$ 33,566	$ 33,374	$ 191	$ 33,566	3%	$ 33,566	3%	
SAM Inc.	Not Applicable	$ -	$ -	$ -	$ 20,770	$ (25,721)	$ (4,952)	0%	$ -	0%	
LBJ Wildflower Center	Soils & Vegetation	$ 3,717	$ -	$ 3,717	$ (101,678)	$ (613)	$ (102,291)	0%	$ -	0%	
Zara Environmental	Environmental Studies and Documentation	$ 20,273	$ 1,480	$ 21,753	$ (68,494)	$ (6,297)	$ (74,791)	2%	$ 21,753	2%	
	Total	**$ 813,123**	**$ 154,481**	**$ 967,604**	**$ 617,022**	**$ (156,099)**	$ 460,922	100%	$ 339,853	35%	

GENERAL MEETING OF THE BOARD OF DIRECTORS
OF THE
CENTRAL TEXAS REGIONAL MOBILITY AUTHORITY

RESOLUTION NO. 15-___

APPROVING A SUPPLEMENT TO THE WORK AUTHORIZATION WITH JACOBS ENGINEERING GROUP INC. FOR PRELIMINARY ENGINEERING AND ENVIRONMENTAL SERVICES FOR THE MOPAC SOUTH PROJECT.

WHEREAS, by Resolution No. 13-022 dated March 27, 2013, the Board of Directors authorized the Executive Director to finalize and execute a professional services contract with Jacobs Engineering Group Inc. ("Jacobs") for preliminary engineering and environmental services for development of the MoPac South Project; and

WHEREAS, the scope of services required for the MoPac South Project has increased as a result of the decision to hold a fourth open house and to provide time to evaluate additional concepts and impacts to the downtown street system related to the addition of lanes on MoPac; and

WHEREAS, the Executive Director and Jacobs have discussed and agreed to a supplement to the work authorization for Jacobs to provide the expanded scope of services, a copy of which has been provided to the Board as agenda backup information for this resolution.

NOW, THEREFORE, BE IT RESOLVED that the Board hereby authorizes the Executive Director to negotiate and execute a supplement to the work authorization with Jacobs in the form or substantially the form provided to the Board as agenda backup information.

Adopted by the Board of Directors of the Central Texas Regional Mobility Authority on the 29th day of July, 2015.

Submitted and reviewed by:

_____
Andrew Martin, General Counsel

Approved:

_____
Ray A. Wilkerson
Chairman, Board of Directors