

COUNTIES	McCracken and Livingston	
ROUTES	US 60 and US 62	
ITEM NUMBERS	1-1115.00, 1-1115.10, and 1-1115.20	
DISTRICT	1 (Paducah)	
PROJECT DESCRIPTION	Paducah-Smithland bridge & approaches over Tennessee River at McCracken/Livingston Co. line, including relocation of US 60 and US 62	
PROJECT MANAGER	William Broyles, P.E.	
USER DIVISION	Materials	
APPROXIMATE FEE	\$1,500,000; including no more than 15% operating margin	
PURPOSE AND NEED	To provide geotechnical services including: drilling, in-situ testing, laboratory testing, conventional and seismic engineering analyses and report writing to support the design of the associated roadways and structures.	
PROCUREMENT SCHEDULE	Response Date	Thursday, February 28, 2002, 4:30 p.m. (Frankfort time)
	Selection Committee Date	March 20, 2002 10:00 a.m.

Pre-Negotiation Meeting	April 2, 2002
Tentative Deadline for Consultant Fee Proposal	April 16, 2002
Contract Negotiations	May 6, 2002
Notice to Proceed	May 30, 2002

**PROJECT SCHEDULE  
& PROJECT  
SCHEDULE  
MILESTONES**

Item No.	1-1115.0	1-1115.10	1-1115.20
Roadway Drilling	Nov. 2002	Sept. 2003	Sept. 2003
Roadway Report	Mar. 2003	Mar. 2004	Mar. 2004
Structure Drilling	Mar. 2003	Dec. 2004	Dec. 2004
Structure Report(s)	Sept. 2003	June 2005	June 2005

The selected consultant will be expected to meet the scheduled milestone dates.

<b>EVALUATION FACTORS</b>	<ol style="list-style-type: none"> <li>1. Project approach and proposed procedures to accomplish the services for the project (10 points)</li> <li>2. Relative experience of consultant personnel assigned to project team with highway projects for KYTC and/or for federal, local or other state governmental agencies (10 points)</li> <li>3. Capacity to comply with project schedule (10 points)</li> <li>4. Past record of performance by firm on projects of similar type and complexity (10 points)</li> <li>5. Consultant has Kentucky offices where work is to be performed (2 points)</li> </ol> <p>75% - 100% of work accomplished in Kentucky offices – 2 points</p> <p>26% - 74% of work accomplished in Kentucky offices – 1 point</p> <p>0% - 25% of work accomplished in Kentucky office - 0 points</p>
<b>SELECTION COMMITTEE MEMBERS</b>	<ol style="list-style-type: none"> <li>1. Darrin Beckett, P.E., User Division</li> <li>2. Bart Asher, P.E., User Division</li> <li>3. Jeff Jasper, P.E., Secretary's Pool</li> <li>4. Jim Rummage, P.E., Secretary's Pool</li> <li>5. Joe Kearnes, P.E., Governor's Pool</li> </ol>
<b>DBE REQUIREMENT</b>	None
<b>SPECIAL INSTRUCTIONS</b>	<p>The Department reserves the option to modify the selected consultant's agreement to include any necessary engineering and/or related services for this project. At that time, the firm(s) will be pre-qualified by the Department in the required area(s).</p> <p>In responding to this ad, Project Approach, there should be an independent discussion and approach for each of the three Item Numbers; however, these independent discussions do not have to be two pages in length for each Item Number.</p> <p>The final span arrangement for the Tennessee River Bridge is not currently known, but is expected to be known at the time of</p>

negotiations.

The selected prime consultant and/or its subconsultants are expected to have significant experience performing work on projects with similar complexity to this one. As a minimum the project team should have the experience and capabilities below.

### **Conventional Geotechnical Engineering Experience and Capabilities**

- Preparing geotechnical submittals in accordance with KYTC format, including: Boring, Laboratory Testing, and Engineering Analysis Plans; Cost Estimates and Invoices for Engineering, Laboratory Testing, and Drilling.
- Preparing CADD drawings including roadway soil profile sheets, embankment and cut stability sheets, structure subsurface data sheets, geotechnical note sheets, and other related drawings in accordance with KYTC format.
- Preparing and Interpreting Subsurface Logs in accordance with KYTC format.
- Preparing Geotechnical Engineering Reports for roadways and structures in accordance with KYTC format.

- Analyzing and/or designing embankments for transportation facilities.
  
- Performing geotechnical engineering analyses for deep foundations (e.g. driven piles and drilled shafts) for bridges over navigable streams.

### **Seismic Geotechnical Engineering Experience and Capabilities**

- Performing seismic geotechnical engineering analyses for the design of bridges, embankments, dams, and/or other major structures, including: Simplified Seismic Site Response, Equivalent-Linear One-Dimensional Site Response, Liquefaction, Earthquake Induced Settlement, Pseudo-Static Seismic Slope Stability, and other related analyses.
  
- Interpreting the results of in-situ testing to be used for seismic geotechnical engineering analyses.

### **Geotechnical Laboratory Qualifications and Capabilities**

- AASHTO Accredited for the following AASHTO test methods:

T87, T88, T89, T90, T99, T100, T193, T208, T216, T296, T297, T265; and capable of performing KM 64-501 (CBR by Kentucky Method), KM 64-513 (Slake Durability), KM-64-514 (Jar Slake), and ASTM D 2938 or KM 64-523 (Unconfined Compression Test on Rock).

### **Drilling and In-Situ Testing Experience and Capabilities**

- Performing roadway soil profile drilling, embankment stability borings, and structures drilling according to standard KYTC requirements.
- Performing floating plant drilling operations on navigable streams with heavy barge traffic.
- Drilling and sampling in sandy soils using drilling fluids to depths exceeding 100 ft.
- Performing in-situ testing on land and on water to depths exceeding 100 ft.

<p><b>SCOPE</b></p>	<p>Services will be performed in general accordance with the KYTC Geotechnical Manual and other applicable KYTC documents.</p> <p>The selected consultant and/or its subconsultants will be required to provide all geotechnical engineering services to support the design of the roadway and structures for these projects. This includes but is not necessarily limited to performing: land and barge drilling, in-situ testing on land and on water, laboratory testing, conventional and seismic geotechnical engineering analyses for the design of the roadway and structures, drafting subsurface data sheets, and preparing geotechnical engineering reports.</p>
<p><b>AVAILABLE KYTC STUDIES</b></p>	<ul style="list-style-type: none"> <li>● Preliminary Plan, Profile, and Cross Section sheets prepared by WMB Inc. These sheets were prepared using metric units; however, this project is expected to be completed using English units.</li>   <li>● Subsurface Data from plans of the existing bridge (Sheets 1 and 1A of Drawing No. 6828).</li> </ul> <p>These documents will be available for review in the Division of Professional Services, Room 610, State Office Building, Frankfort, Kentucky, between the hours of 9:00 a.m. and 3:00 p.m. (EDT) from February 13, 2002 until February 27, 2002</p> <p>After February 12, 2002, consultants may obtain copies from Lynn copies, 1122 US Highway 127 South, Frankfort, Kentucky 40601, Phone: 502/875-8341. Lynn Copies will set costs.</p>
<p><b>PROJECT LENGTH</b></p>	<p>Approximately 4 miles total</p>

PROJECT FUNDING	Federal Funds (BRO and STP)
PREQUALIFICATION REQUIREMENTS	<p data-bbox="493 222 959 260"><u><a href="#">GEOTECHNICAL SERVICES</a></u></p> <ul data-bbox="548 321 878 443" style="list-style-type: none"><li>• Drilling</li><li>• Laboratory Testing</li><li>• Engineering</li></ul> <p data-bbox="483 495 1560 741">Identify any subconsultants to be used in the response to this bulletin. All subconsultants must be pre-qualified in the applicable categories; however it will not be necessary for a subconsultant used to perform in-situ testing and data reduction to be pre-qualified, if the firm is approved by the geotechnical branch and is working under the direct supervision of the prime geotechnical consultant.</p>

LOCATION MAP: [1-115.00](#) [1-1115.10](#) [1-1115.20](#)