In accordance with paragraph 1.01 of the Master Agreement Between OWNER and ENGINEER for Professional Services dated May 1, 2007 ("Agreement"), Task Order # 7015-01 dated 7/11/2007, Amendment #1 to Task Order #7015-01; Amendment #2 to Task Order #7015-01; and Amendment #3 to Task Order #7015-01, OWNER and ENGINEER agree as follows to amend Task Order # 7015-01:

Specific Project Data

- A. Title: Crossville Memorial Airport T-Hanger Expansion Phase II
- B. Description: The Project is to construct a 10-Unit T-Hanger Building and an 6-Unit T-Hanger Building with all necessary appurtenances at the Crossville Memorial Airport and to provide foundation design, site design, electrical system design, and coordination with the Federal Aviation Administration for the relocation of the ASOS system from its current location to an agreed upon location. To prepare Engineering and Construction Plans and Technical Specifications for the project. ENGINEER will prepare design related permits as required for the project. ENGINEER shall provide surveying services, biological assessment, wetland assessment and geotechnical Engineering services as required for the project. The ENGINEER shall also provide construction administration and inspection services under this task order. The Project shall also include: The relocation of the wind directional indicator and indicator circle from its present location to the new location as defined by the latest ALP, as developed by PBS&J; Construction of a 100' x 100' building pad for future hanger with all necessary appurtenances; Construction of a fuel tank pad for future fuel operations by others with all necessary appurtenances.
- C. The purpose of this Amendment is to address the extra Construction Phase Engineering Services performed beyond the estimated Scope of Services, as outlined below under "Services of ENGINEER, Construction Phase," and as depicted below:

Origina	\$53,000.00		
Unexpe	\$102,311.25		
•	Excessive progress meeting durations, excessive markups and resubmission reviews of pay request and project submittals		
•	Extra progress meetings and pay requests past final completion date	\$8,270.00	
0	Extra design work required for Building manufacture change	\$1,685.00	
0	Extra time spent helping Contractor complete DBE paperwork	\$3,197.50	
•	70% - Extra time spent breaking out time spent on project and meeting with TDOT to discuss	\$6,076.00	
0	Extra time spent on research and meetings to prevent contract cost increase due to electrical service issue	\$7,042.50	
•	Additional testing services required for QA/QC failures with concrete, soil, and stone		
•	Additional engineering design and analysis on firewall that did not meet plan and code	\$4,860.00	

requirements										
• TDOT to Reimburse for Payment to Engineer (90/10 Funding) \$17,644.00										
0										
0	o Extra time spent on Change Orders \$1,620.00									
0	Extra time spent meeting and discussing funding	\$4,337.50								
	Scenarios									
O	Extra time spent due to Undercut issue	\$3,470.00								
0	Extra time spent on Work Change Directives	\$1,892.50								
O	30% - Extra time spent breaking out time spent	\$2,604.00								
	on project and meeting with TDOT to discuss									
Unexpected Fees from 1/1/12 to 3/31/12 (time to complete project) \$12,326.65										
Subtotal of Unexpected Fees during Construction Phase for Project <u>\$132,281.9</u>										
Total Engineering Fees for Construction Phase of Project <u>\$185,281.</u>										
Amount Paid to	Date of Original \$53,000		(\$47,018.55)							
Amount Remain	ing in Contract – Construction Phase		(\$5,981.45)							
Amount Remaining in Contract – Preliminary Design (\$2,177.00)										
TDOT to Reimburse (90/10 Funding) (\$17,644.00)										
Liquidated dama	Liquidated damages from Contractor to be Paid (\$19,503.47)									
Request for Closeout Payment \$92,957.43										

D. This Amendment to Task Order #7015-01 shall supercede and replace all previous Task Orders and Amendments on this Project.

Services of ENGINEER

Study and Report Phase

- A. The study and the report phase has been completed and included an evaluation of the original proposed site including wetland delineation, topographic surveying, subsurface drilling, and preliminary site design. A cost estimate was prepared for the original site and an alternate site to the east of the main airport entrance.
- B. Compensation for the study and report phase was included in the Preliminary Design Phase under Payments to ENGINEER.

Preliminary Design Phase

- A. As authorized by OWNER, ENGINEER performed Preliminary Design Phase Services for the selected site as follows:
 - Perform topographic surveying of site and existing features in the project area to be utilized
 in the design of the project. This work does not include any property survey or property
 surveying related work. Any property survey work will be performed and OWNER to be
 provided with a fee schedule outlining the additional services at the time of authorization;
 - 2. Perform a geotechnical investigation and report to be utilized for foundation design, based on eight (8) standard auger borings with no required core drilling;
 - 3. Prepare General NPDES Permit for discharges of stormwater associated with construction activities; not included is any required individual permit, Corp of Engineers 404, or other

- required permit. Any additional permits or actions will be performed and OWNER to be provided with a fee schedule outlining the additional services at the time of authorization;
- 4. Prepare an estimate of construction cost;
- 5. Prepare a preliminary layout design for the proposed site and building;
- 6. Furnish the Preliminary Design Phase documents to and review them with OWNER;
- 7. Submit to OWNER three copies of the Preliminary Design Phase documents and revised opinion of probable Construction Cost for the OWNER'S review.
- 8. Make necessary revisions from OWNER'S review and submit revised documents to OWNER.
- B. ENGINEER services under the Preliminary Design Phase are complete.

Final Design Phase

- A. As authorized by OWNER, ENGINEER performed Final Design Phase Services as follows:
 - 1. Show existing utility services affected by the proposed project and to be relocated on the plans.
 - 2. Check all required clearances for the building separations in aircraft travel ways.
 - Prepare Engineering and construction plans. The final plans shall include all information necessary to obtain TDOT Aeronautics Division approval and all information necessary for construction indicating the scope, extent, and character of the Work to be performed and furnished by Contractor.
 - 4. Specifications will be prepared, where appropriate, in general conformance with the 16-division format of the Construction Specifications Institute.
 - Submit to OWNER three copies of the Final Design Phase documents and revised opinion of probable Construction Cost within the time period set forth in the Task Order for the OWNER'S review. Document reproduction fee applies to all material over the standard three sets.
 - 6. Prepare revisions to the Final Design Phase documents as required from OWNER'S review and submit revised documents to OWNER. All original documents, survey notes, tracings, and any similar documentation except those furnished to the ENGINEER by the OWNER are and shall remain the property of the ENGINEER.
- B. ENGINEER services under the Final Design Phase are complete.

Bidding or Negotiating Phase

- A. As authorized by OWNER, ENGINEER performed Bidding Phase Services as follows:
 - 1. Prepare and/or assist the OWNER in advertising the project for bidding.
 - 2. Prepare all necessary documents for bidding. Document reproduction fee applies to this section above the standard set provided to the OWNER.
 - 3. Hold a pre-bid conference, to allow potential bidders to discuss the project.
 - 4. Establish Bid Date and process all request for plans.
 - 5. Hold and/or assist the OWNER in Bid Opening.
 - 6. Assist OWNER in evaluating bid information supplied by the Bidders and make a recommendation in regards to the OWNER'S concurrence with the bid obtained.

- B. All work is this section applies to a single bidding process and no re-bidding due to rejection of bids by OWNER. Any re-bid actions will be performed and OWNER to be provided with a fee schedule outlining the additional services at the time of authorization.
- C. ENGINEER services under the Bidding or Negotiating Phase are complete.

Construction Phase

- A. As authorized by OWNER, ENGINEER performed Construction Phase Services as follows:
 - General Administration of Construction Contract. Consult with OWNER and act as OWNER'S
 representative as provided in the General Conditions. The extent and limitations of the
 duties, responsibilities and authority of ENGINEER as assigned in said General Conditions
 shall not be modified, except as ENGINEER may otherwise agree in writing. All of OWNER'S
 instructions to Contractor will be issued through ENGINEER, who shall have authority to act
 on behalf of OWNER in dealings with Contractor to the extent provided in this Agreement and
 said General Conditions except as otherwise provided in writing.
 - 2. Resident Project Representative (RPR). Provide the services of an RPR at the Site of the Specific Project to assist the ENGINEER and to provide more extensive observation of Contractor's work, if requested and paid additional by the OWNER. Duties, responsibilities, and authority of the RPR are as set forth in the Agreement. Exhibit D, "Duties, Responsibilities and Limitations of Authority of Resident Project Representative. The furnishing of such RPR's services will not extend ENGINEER responsibilities or authority beyond the specific limits set forth elsewhere in this Agreement.
 - 3. Testing Services. Provide field and laboratory testing services for the construction phase.
 - 4. Pre-Construction Conference. Participate in a Pre-Construction Conference prior to commencement of Work at the Site.
 - 5. Baselines and Benchmarks. As appropriate, establish baselines and benchmarks for locating the Work, which in ENGINEER judgment are necessary to enable Contractor to proceed.
 - Visits to Site and Observation of Construction. In connection with observations of Work in progress
 - a. Make visits to the Site at intervals appropriate to the various stages of construction, as ENGINEER deems necessary, in order to observe as an experienced and qualified design professional the progress and quality of the Work. Such visits and observations by ENGINEER, and the Resident Project Representative, if any, are not intended to be exhaustive or to extend to every aspect of the Work in progress or to involve detailed inspections of the Work in progress beyond the responsibilities specifically assigned to ENGINEER in the Task Order and the Contract Documents, but rather are to be limited to spot checking, selective sampling, and similar methods of general observation of the Work based on ENGINEER exercise of professional judgment as assisted by the Resident Project Representative, if any. Based on information obtained during such visits and such observations, ENGINEER will determine in general if Contractor's work is proceeding in accordance with the Contract Documents, and ENGINEER shall keep OWNER informed of the progress of the Work.
 - b. The purpose of ENGINEER visits to, and representation by the Resident Project Representative, if any, at the Site of the Specific Project, will be to enable ENGINEER to better carry out the duties and responsibilities assigned to and undertaken by ENGINEER during the Construction Phase, and, in addition, by the exercise of ENGINEER efforts as an experienced and qualified design professional, to provide for OWNER a greater degree of confidence that the completed Work will conform in general to the Contract Documents and that the integrity of the design concept of the completed project as a functioning whole as indicated in the Contract Documents has been implemented and

preserved by Contractor. ENGINEER shall not, during such visits or as a result of such observations of Contractor's work in progress, supervise, direct, or have control over the Work, nor shall ENGINEER have authority over or responsibility for the means, methods, techniques, sequences, or procedures of construction selected by Contractor, for safety precautions and programs incident to the Work, or for any failure of Contractor to comply with Laws and Regulations applicable to Contractor's furnishing and performing the Work. Accordingly, ENGINEER neither guarantees the performance of any Contractor nor assumes responsibility for any Contractor's failure to furnish and perform its work in accordance with the Contract Documents.

- 7. Defective Work. Have authority to disapprove or reject Contractor's work while it is in progress if, on the basis of such observations, ENGINEER believes that such work will not produce a completed project that conforms generally to the Contract Documents or that it will prejudice the integrity of the design concept of the completed project as a functioning whole as indicated in the Contract Documents.
- 8. Clarifications and Interpretations; Field Orders. Issue necessary clarifications and interpretations of the Contract Documents as appropriate to the orderly completion of the Work. Such clarifications and interpretations will be consistent with the intent of and reasonably inferable from the Contract Documents. ENGINEER may issue Field Orders authorizing minor variations from the requirements of the Contract Documents.
- Change Orders and Work Change Directives. Recommend Change Orders and Work Change Directives to OWNER, as appropriate, and prepare Change Orders and Work Change Directives as required.
- 10. Shop Drawings and Samples. Review and approve or take other appropriate action in respect to Shop Drawings and Samples and other data which Contractor is required to submit, but only for conformance with the information given in the Contract Documents and compatibility with the design concept of the completed project as a functioning whole as indicated in the Contract Documents. Such reviews and approvals or other action will not extend to means, methods, techniques, sequences or procedures of construction or to safety precautions and programs incident thereto. ENGINEER has an obligation to meet any Contractor's submittal schedule that has earlier been acceptable to ENGINEER.
- 11. Substitutes and "or-equal". Evaluate and determine the acceptability of substitute or "or-equal" materials and equipment proposed by Contractor, but subject to the provisions of paragraph A2.02.A.2 of this Exhibit A.
- 12. Inspections and Tests. Require such special inspections or tests of the Work as deemed reasonably necessary, and receive and review all certificates of inspections, tests, and approvals required by Laws and Regulations or the Contract Documents. ENGINEER review of such certificates will be for the purpose of determining that the results certified indicate compliance with the Contract Documents and will not constitute an independent evaluation that the content or procedures of such inspections, tests, or approvals comply with the requirements of the Contract Documents. ENGINEER shall be entitled to rely on the results of such tests.
- 13. Disagreements between OWNER and Contractor. Render formal written decisions on all claims of OWNER and Contractor relating to the acceptability of the Work or the interpretation of the requirements of the Contract Documents pertaining to the execution and progress of the Work. In rendering such decisions, ENGINEER shall be fair and not show partiality to OWNER or Contractor and shall not be liable in connection with any decision rendered in good faith in such capacity.

- 14. Applications for Payment. Based on ENGINEER observations as an experienced and qualified design professional and on review of Applications for Payment and accompanying supporting documentation:
 - a. Determine the amounts that ENGINEER recommends Contractor be paid. Such recommendations of payment will be in writing and will constitute ENGINEER representation to OWNER, based on such observations and review, that, to the best of ENGINEER knowledge, information and belief, the Work has progressed to the point indicated, the quality of such is generally in accordance with the Contract Documents (subject to an evaluation of the Work as a functioning whole prior to or upon Substantial Completion, to the results of any subsequent tests called for in the Contract Documents and to any other qualifications stated in the recommendation), and the conditions precedent to Contractor's being entitled to such payment appear to have been fulfilled in so far as it is ENGINEER responsibility to observe the Work. In the case of unit price work, ENGINEER recommendations of payment will include final determinations of quantities and classifications of the Work (subject to any subsequent adjustments allowed by the Contract Documents). The responsibilities of ENGINEER contained in paragraph Al.05.A.6.a are expressly subject to the limitations set forth in paragraph Al.05.A.6.b and other express or general limitations in this Agreement and elsewhere.
 - b. By recommending any payment, ENGINEER shall not thereby be deemed to have represented that observations made by ENGINEER to check the quality or quantity of the Work as it is performed and furnished have been exhaustive, extended to every aspect of the Work in progress, or involved detailed inspections of the Work beyond the responsibilities specifically assigned to ENGINEER in this Agreement and the Contract Documents. Neither ENGINEER review of the Work for the purposes of recommending payments nor ENGINEER recommendation of any payment including final payment will impose on ENGINEER responsibility to supervise, direct, or control the Work in progress or for the means, methods, techniques, sequences, or procedures of construction or safety precautions or programs incident thereto, or Contractor's compliance with Laws and Regulations applicable to the Work. It will also not impose responsibility on ENGINEER to make any examination to ascertain how or for what purposes Contractor has used the moneys paid on account of the Contract Price, or to determine that title to any portion of the work in progress, materials, or equipment has passed to OWNER free and clear of any liens, claims, security interests, or encumbrances, or that there may not be other matters at issue between OWNER and Contractor that might affect the amount that should be paid.

15. Contractor's Completion Documents.

- a. Receive and review maintenance and operating instructions, schedules, and guarantees.
- b. Receive bonds, certificates, or other evidence of insurance not previously submitted and required by the Contract Documents, certificates of inspection, tests and approvals, Shop Drawings, Samples and other data approved as provided under paragraph Al.05.A.10, and the annotated record documents which are to be assembled by Contractor in accordance with the Contract Documents to obtain final payment. The extent of such ENGINEER review will be limited asprovidedinparagraphAl.05.A.10.
- ENGINEER shall transmit these documents to OWNER.
- 16. Substantial Completion. Promptly after notice from Contractor that Contractor considers the entire Work ready for its intended use, in company with OWNER and Contractor, conduct an inspection to determine if the Work is Substantially Complete. If after considering any objections of OWNER, ENGINEER considers the Work Substantially Complete, ENGINEER shall deliver a certificate of Substantial Completion to OWNER and Contractor.

- 17. Final Notice of acceptability of the Work. Conduct a final payment inspection to determine if the completed Work of Contractor is acceptable so that ENGINEER may recommend, in writing, final payment to Contractor. Accompanying the recommendation for final payment, ENGINEER shall also provide a notice in the form attached hereto as Exhibit E ("Notice of Acceptability of Work") that the Work is acceptable (subject to the provisions of paragraph Al.05.A. 14.b) to the best of ENGINEER knowledge, information, and belief and based on the extent of the services provided by ENGINEER under this Agreement.
- B. Duration of Construction Phase. The Construction Phase will commence with the execution of the first Construction Agreement for a Specific Project or any part thereof and will terminate upon written recommendation by ENGINEER for final payment to Contractors.
- C. Limitation of Responsibilities. ENGINEER shall not be responsible for the acts or omissions of any Contractor, or of any of their subcontractors, suppliers, or of any other individual or entity performing or furnishing any of the Work. ENGINEER shall not be responsible for failure of any Contractor to perform or furnish the Work in accordance with the Contract Documents.
- D. ENGINEER services under the Construction Phase are complete.

PART 2 -- ADDITIONAL SERVICES

Additional Services Requiring OWNER'S Authorization in Advance

- A. If authorized in writing by OWNER, ENGINEER shall furnish or obtain from others Additional Services of the types listed below. These services will be paid for by OWNER as indicated in a Task Order.
 - Preparation of applications and supporting documents (in addition to those furnished under Basic Services) for private or governmental grants, loans or advances in connection with a Specific Project; preparation or review of environmental assessments and impact statements; review and evaluation of the effects on the design requirements for a Specific Project of any such statements and documents prepared by others; and assistance in obtaining approvals of authorities having jurisdiction over the anticipated environmental impact of a Specific Project.
 - 2. Services to make measured drawings of or to investigate existing conditions or facilities, or to verify the accuracy of drawings or other information furnished by OWNER.
 - 3. Services resulting from significant changes in the scope, extent, or character of the portions of a Specific Project designed or specified by ENGINEER or its design requirements including, but not limited to, changes in size, complexity, OWNER'S schedule, character of construction, or method of financing; and revising previously accepted studies, reports, Drawings, Specifications, or Contract Documents when such revisions are required by changes in Laws and Regulations enacted subsequent to the Effective Date of the Task Order or are due to any other causes beyond ENGINEER control.
 - 4. Services resulting from OWNER'S request to evaluate additional Study and Report Phase alternative solutions beyond those identified in paragraph Al.Ol.A.4.
 - 5. Services required as a result of OWNER'S providing incomplete or incorrect project information with respect to Exhibit B.
 - 6. Providing renderings or models for OWNER'S use.
 - 7. Undertaking investigations and studies including, but not limited to, detailed consideration of operations, maintenance, and overhead expenses; the preparation of feasibility studies, cash flow and economic evaluations, rate schedules, and appraisals; assistance in obtaining financing for a Specific Project; evaluating processes available for licensing, and assisting OWNER in obtaining process licensing; detailed quantity surveys of materials, equipment, and labor; and audits or inventories required in connection with construction performed by OWNER.

- 8. Furnishing services of ENGINEER Consultants for other than Basic Services.
- 9. Services attributable to more prime construction contracts than specified in the Task Order.
- Services during out-of-town travel required of ENGINEER other than for visits to the Specific Project Site or OWNER'S office.
- 11. Preparing for, coordinating with, participating in and responding to structured independent review processes, including, but not limited to, construction management, cost estimating, project peer review, value Engineering, and constructability review requested by OWNER; and performing or furnishing services required to revise studies, reports, Drawings, Specifications, or other Bidding Documents as a result of such review processes.
- 12. Preparing additional Bidding Documents or Contract Documents for alternate bids or prices requested by OWNER for the Work or a portion thereof.
- 13. Determining the acceptability of substitute materials and equipment proposed during the Bidding or Negotiating Phase when substitution prior to the award of contracts is allowed by the Bidding Documents.
- 14. Assistance in connection with Bid protests, rebidding, or renegotiating contracts for construction, materials, equipment, or services, except when such assistance is required by Exhibit F.
- 15. Providing construction surveys and staking to enable a Contractor to perform its work other than as required under Basic Services, and any type of property surveys or related Engineering services needed for the transfer of interests in real property; and providing other special field surveys.
- 16. Providing Construction Phase services beyond the Contract Times set forth in the Task Order.
- 17. Providing assistance in resolving any Hazardous Environmental Condition in compliance with current Laws and Regulations.
- Preparing and Furnishing to OWNER, in the format agreed to, Record Drawings showing appropriate record information based on project annotated record documents received from Contractor.
- 19. Preparation of operation and maintenance manuals.
- 20. Preparing to serve or serving as a consultant or witness for OWNER in any litigation, arbitration or other dispute resolution process related to a Specific Project.
- 21. Providing more extensive services required to enable ENGINEER to issue notices or certifications requested by OWNER under paragraph 6.0l.G of the Agreement or a Task Order.
- 22. Services in connection with Work Change Directives and Change Orders to reflect changes requested by OWNER so as to make the compensation commensurate with the extent of the Additional Services rendered.
- 23. Services in making revisions to Drawings and Specifications occasioned by the acceptance of substitute materials or equipment other than "or-equal" items; and services after the award of any Construction Agreement in evaluating and determining the acceptability of a substitution which is found to be inappropriate for a Specific Project or an excessive number of substitutions.
- 24. Services resulting from significant delays, changes, or price increases occurring as a direct or indirect result of materials, equipment, or energy shortages.

- 25. Additional or extended services during construction made necessary by (a) a significant amount of defective, neglected or delayed Work by a Contractor, or (b) default by a Contractor.
- 26. Services (other than Basic Services during the Post-Construction Phase) in connection with any partial utilization of any part of the Work on a Specific Project by OWNER prior to its Substantial Completion.
- Evaluating an unreasonable claim or an excessive number of claims or requests for information submitted by a Contractor or others in connection with the Work on a Specific Project.
- 28. Other services performed or furnished by ENGINEER not otherwise provided for in this Agreement or a Task Order.

Additional Services Not Requiring OWNER'S Authorization in Advance

- A. ENGINEER shall perform or furnish, without requesting or receiving specific advance authorization from OWNER, the Additional Services of the types listed below. ENGINEER shall advise OWNER in writing within seven days after beginning any such Additional Services. If OWNER does not want ENGINEER to continue to perform or furnish the services, OWNER shall notify ENGINEER in writing to cease, and ENGINEER shall comply.
 - 1. Additional or extended services during construction made necessary by (a) emergencies or acts of God endangering the Work, (b) an occurrence of a Hazardous Environmental Condition, (c) Work damaged by fire or other cause during construction, or (d) acceleration of the progress schedule involving services beyond normal working hours.

OWNER'S Responsibilities

See Exhibit B

Times for Rendering Services

Phase	Time Frame
Preliminary Design Phase	Complete
Final Design Phase	Complete
Bidding Phase	Complete
Construction Phase	Complete

Payments to ENGINEER

A. Method(s) of Payment by Phases

OWNER shall pay ENGINEER for services within each phase as follows:

Method of Payment											
Basic Services	Limit	Additional Services	Limit								
Method B	\$10,500 - HUC	Method B									
Method B	\$14,000 - HUC										
Method B	\$5,000 - HUC										
Method B	\$2,100 - HUC										
Method B	-\$2,177										
Method A	\$104,500	Method B									
Method B	\$53,000	Method B									
	(6)										
Method B	\$2,177	1									
	Method B Method B Method B Method B Method B Method A Method B	Basic Services Limit Method B Method A S104,500 \$10,500 - HUC MUC MUC MUC MUC MUC MUC METHOD MUC METHOD MUC METHOD METHOD MUC	Basic Services Limit Limit Services Additional Services Method B Method B Method B St,000 - HUC Method B St,000 - HUC Method B St,000 - HUC Method B St,100 - HUC Method B St,177 Method A \$104,500 Method B Method B Method B Method B St,000 Method B Method B Method B Method B Method B								

The above limits are set by agreement but may be amended at any time. A limit shall not be interpreted as a not to exceed number.

Other Modifications to Master Agreement:

N/A

Attachments:

OWNER-ENGINEER Agreement in TDOT Aeronautics Format

Exhibit C

Exhibit C Appendix I

Exhibit C Appendix II

Documents Incorporated By Reference:

None

Approval and Acceptance:

Approval and Acceptance of this Amendment to Task Order, including the attachments listed above, shall incorporate this document as part of the Agreement. ENGINEER is authorized to begin performance upon its receipt of a copy of this Task Order signed by OWNER.

The Effective Date of this Task Order is:	
ENGINEER:	OWNER:
Chuck F. Burgess, P.E., NSPE, ASCE Date Partner	Hon. J. H. Graham, III, Date Mayor
DESIGNATED REPRESENTATIVE FOR TASK ORDER:	DESIGNATED REPRESENTATIVE FOR TASK ORDER:
Chuck F. Burgess, P.E., NSPE, ASCE Partner	Mr. Tim Begley, E.I. Director of Engineering
702 Old Jamestown Highway Crossville, TN 38555	99 Municipal Avenue Crossville, TN 38555
cburgess@eceservices.com E-Mail Address	tim.begley@crossvilletn.gov E-Mail Address
931.484.9321 Phone	931-456-6172 Phone
931.484.9322 Fax	931-484-7713 Fax

)wner-Engineer Agreement	
Crossville Airport T-Hangers	Ph II
May 7, 2010	

OWNER-ENGINEER AGREEMENT

THIS AGREEMENT, made this _____ day of ______, 2010, by and between the City of Crossville, hereinafter called the OWNER, and Environmental & Civil Engineering Services, hereinafter called the ENGINEER. Witnesseth, that whereas the OWNER intends to make the following improvements:

- A. Construct a 10-Unit T-Hanger Building with all necessary appurtenances and engage the Engineer to perform specified services.
- B. Construct a 6-Unit T-Hanger Building with all necessary appurtenances and engage the Engineer to perform specified services.
- C. Relocate the existing ASOS system at the airport with all necessary appurtenances in coordination with the Federal Aviation Administration (FAA) and engage the Engineer to perform specified services.
- D. Relocate wind directional indicator and indicator circle at airport from its present location to the new location as defined by the latest ALP, as developed by PBS&J, and engage Engineer to perform specified services.
- E. Construction of a 100' x 100' building pad for future hanger with all necessary appurtenances and engage the Engineer to perform specified services.
- F. Construction of a fuel tank pad for future fuel operations by others with all necessary appurtenances and engage the Engineer to perform specified services.

NOW, THEREFORE, the OWNER and the ENGINEER, for the considerations hereinafter named, agree as follows:

SECTION I - SERVICES OF THE ENGINEER

The ENGINEER agrees to perform, for the above-named PROJECT, professional services as hereinafter set forth:

- 1.1 Survey to obtain design plane\digital terrain model of project area.
- 1.2 Provide a subsurface investigation for the PROJECT to determine the Foundation Requirements for the PROJECT, including such soil tests that are required to prepare construction plans and specifications.
- 1.3 Perform a delineation of all regulatory wetlands within the project limits.
- 1.4 Preparation of "As-Construction Plans" upon completion of the PROJECT. Provide the TDOT standard digital files and a full-size set of prints to the OWNER and the Tennessee Aeronautics Division (TAD).
- 1.5 For the purposes of obtaining competitive bids:

- A. Prepare and obtain OWNER'S approval of detailed drawings, plans and crosssections to show the character and scope of the work to be performed by contractors on the PROJECT, including such specifications, instructions to bidders, general conditions, special conditions, and technical provisions are required by the OWNER.
- B. Furnish the OWNER engineering data for, and assist in the preparation of the required documents so that the OWNER may secure approval of such governmental authorities as have jurisdiction over design criteria applicable to the project.
- C. Prepare Notice to Bidders, proposed forms, contract documents and bond forms. The contract and bond forms will be furnished by the ENGINEER subject to the OWNER's approval.
- 1.6 Evaluate and determine whether or not contractors requesting proposals are licensed by the State of Tennessee to perform that work upon which they wish to bid, and bring to the attention of the OWNER any requests from unqualified contractors. Advise the OWNER as to the relative ability and reliability of the bidders and make recommendations to the OWNER.
- 1.7 Perform the control staking and layout of the PROJECT:
 - A. The Engineer shall establish horizontal and vertical control.
 - B. The contractor will be in a position to commence construction operations once his construction staking has been verified by the Engineer on any or all portions of the PROJECT. Such verification of contractor staking shall consist of verifying the placement of all hubs, pins, wires, slope stakes, blue top stakes and other systems of control as might be used by the Contractor.
 - C. Set benchmark.
 - D. The contractor will be held responsible for replacing stakes which are destroyed by his negligence and for ensuring the accuracy thereof.
- 1.8 Provide construction administration to the extent necessary to determine whether the PROJECT is constructed in accordance with approved plans and specifications. PROJECT daily diaries shall be submitted weekly. The ENGINEER will endeavor to guard against defects and deficiencies in the work of the contractor, check the quality and documents. The ENGINEER shall strive to maintain constant awareness for the PROJECT's financial status and immediately notify the OWNER of area of the PROJECT that may potentially deviate appreciably from the established project budget.
- 1.9 Provide a full-time Resident Project Representative for observation of the PROJECT's construction. The person employed for this purpose will be subject to the approval of the OWNER.

- A. The Residential Project Representative shall:
 - (1) Serve as the ENGINEER's liaison with the contractor, working principally through the contractor's superintendent.
 - (2) Cooperate with the contractor in dealing with the various local agencies having jurisdiction over the PROJECT in order to complete connections to public utilities and facilities.
 - (3) Accompany visiting inspectors representing public or other agencies having jurisdiction over the PROJECT, record these visits in the Aeronautics Division Daily Diaries and indicate the out come of the inspections.
 - (4) Keep a daily log of quantities and diaries recording hours on the job site, weather conditions, list of visiting officials, daily activities, decisions.
- B. It is further expected that there will be temporary delays in construction that cannot be foreseen by the ENGINEER.
- 1.10 Provide sufficient construction testing to determine that the work conforms substantially with the plans and specifications.
 - A. Furnish the OWNER with copies of results of all tests required in the construction of the PROJECT within five (5) days after the tests are performed with recommendations, if necessary, of the ENGINEER.
- 1.11 Check and approve any shop drawings or drawings of temporary structures prepared by the contractor.
- 1.12 Attend all necessary conferences, including a pre-construction conference, with the OWNER and/or contractor for the purpose of consultation, advice, and instructions on matters concerning the interpretation of plans, specifications and contracts or on other questions pertaining to the PROJECT.
- 1.13 Prepare and submit periodic and final estimates for payment to the contractor based on complete construction. Such estimates shall be submitted promptly by the fifth of each month unless otherwise agreed upon by the contractors and the OWNER. Prepare and submit to the OWNER all periodic and final payment progress forms required by agencies having jurisdiction over the PROJECT.
- 1.14 Make final inspections and report when all construction work is satisfactorily completed in accordance with the plans and specifications.
- 1.15 As relates to financial completion of the project, the ENGINEER shall provide all of the following information in a timely fashion upon physical completion of the construction:
 - A. Summary of Engineering and Construction Costs.

- B. Contractor Payment Estimates.
- C. Copies of all Change Orders and Supplemental Agreements.
- D. Copies of all consultant Engineer payment invoices.
- E. Contract time record.
- F. Summary of material testing.
- G. As-built construction plans.
- 1.16 The ENGINEER shall maintain all books, documents, papers, accounting records, and other evidence pertaining to costs incurred and make such materials available at their offices at all reasonable times during the contract period and for (3) years from the date of final payment under the Contract for inspection by either Federal or State agents and copies thereof shall be furnished if requested.
- 1.17 Title VI Assurances -- During the performance of this Agreement, the ENGINEER, for itself, its assignees and successors in interest agree as follows:
 - A. <u>Compliance with Regulations:</u> The ENGINEER shall comply with the Regulations relative to nondiscrimination in federally assisted programs of the Department of Transportation (hereinafter, "DOT") Title 49, Code of Federal Regulations, Part 21, as they may be amended from time to time, (hereinafter referred to as the Regulations), which are hereinafter incorporated by reference and made a part of this contract.
 - B. <u>Nondiscrimination</u>: The ENGINEER, with regard to the work performed by it during the contract, shall not discriminate on the grounds of race, color, or national origin in the selection and retention of subcontractors, including procurement of materials and leases of equipment. The ENGINEER shall not participate either directly or indirectly in the discrimination prohibited by Section 21.5 of the Regulations, including employment practices when the contract covers a program set forth in Appendix B of Regulations.
 - C. <u>Solicitations for Subcontracts, Including Materials and Equipment.</u> In all solicitations either by competitive bidding or negotiation made by the ENGINEER for work to be performed under a subcontract, including procurement of materials or leases of equipment, such potential subcontractor or supplier shall be notified by the ENGINEER of the engineer's obligations under this contract and the Regulations relative to nondiscrimination on the grounds of race, color, or national origin.
 - D. <u>Information and Reports:</u> The ENGINEER shall provide all information and reports required by the Regulations or directives issued pursuant thereto and

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shall permit access to its books, records, accounts, other sources of information, and its facilities as may be determined by the sponsor or the Federal Aviation Administration (FAA) to be pertinent to ascertain compliance with such Regulations, orders and instructions. Where any information required of an engineer is in the exclusive possession of another who fails or refuses to furnish this information, the ENGINEER shall so certify to the sponsor or the FAA, as appropriate, and shall set forth what efforts it has made to obtain the information.

- E. <u>Sanctions for Non-compliance</u>. In the event of the ENGINEER's non-compliance with the non-discrimination provisions of this Agreement, the OWNER shall impose such contract sanctions as it or the FAA may determine to be appropriate, including, but not limited to --
 - (1) Withholding of payments to the ENGINEER under the Agreement until the ENGINEER complies, and/or
 - (2) Cancellation, termination, or suspension of the Agreement in whole or in part.
- F. Incorporation of Provisions: The ENGINEER shall include the provisions of Paragraphs A through E in every subcontract, including procurement of materials and leases of equipment, unless exempt by the Regulations or directives issued pursuant thereto. The ENGINEER shall take such action with respect to any subcontract or procurement as the OWNER or the FAA may direct as a means of enforcing such provisions including sanctions for noncompliance. Provided, however, that in the event the ENGINEER become involved in, or is threatened with, litigation with a subcontractor or supplier as a result of such direction, the ENGINEER may request the OWNER, and, in addition, the ENGINEER may request the United States to enter into such litigation to protect the interests of the United States.

1.18 Disadvantaged Business Enterprises (DBE) Assurances:

- A. <u>Policy:</u> It is the policy of the Department of Transportation (DOT) that disadvantaged business enterprises as defined in 49 CFR Part 26 shall have a maximum opportunity to participate in the performance of contracts financed in whole or in part with Federal funds under this agreement. Consequently, the DBE requirements of 49 CFR Part 26 apply to this Agreement.
- B. <u>DBE Obligation</u>: The ENGINEER agrees to ensure that disadvantaged business enterprises participate in the performance of contracts and subcontracts financed in whole or in part with Federal funds provided under this Agreement. In this regard, the ENGINEER shall take all necessary and reasonable steps in accordance with 49 CFR Part 26 to ensure that disadvantaged business enterprises have the maximum opportunity to compete for and perform contracts. The ENGINEER or subcontractors shall not discriminate on the basis

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of race, color, national origin or sex in the award and performance of DOT assisted contracts.

1.19 In the event an error is made in the plans or specifications, the Engineer will correct the error in the plans or specifications, and the Engineer's services rendered in connection with correcting the error shall be considered as part of the Basic Services, to the extent that the error arises from the negligent acts, errors or omissions of the Engineer.

However, if the cost to the Owner of correcting the error includes tearing out or redoing any portion of the project, the cost associated with the redoing or tearing out shall not be considered a part of the overall project cost for the purpose of calculating the Engineer's fee for Basic Services.

1.20 The laws of the state of Tennessee shall apply. The venue for any litigation arising pursuant to this Agreement shall be Cumberland County Circuit Court.

SECTION II - THE OWNER'S RESPONSIBILITIES

- 2.1 Provide full information as to the requirements for the PROJECT.
- 2.2 Assist the ENGINEER by placing at his disposal all available information pertinent to the site of the PROJECT including previous reports and any other data relative to design and construction of the PROJECT. This includes providing topographical information/files to be used for design on this project.
- 2.3 Examine all studies, report, sketches, estimates, specification, drawings, proposals, and other documents presented and recommended by the ENGINEER and render in writing decisions pertaining thereto within a reasonable time so as not to delay the work of the ENGINEER.
- 2.4 Obtain approval of all governmental authorities having jurisdiction over the PROJECT and such approvals and consents from such other individuals or bodies as may be necessary for completion of the PROJECT.
- 2.5 Give prompt written notice to the ENGINEER whenever the OWNER observes or otherwise becomes aware of any defect in the PROJECT.

SECTION III - PAYMENT TO THE ENGINEER

3.1

Basic	1 ******	200 AND 15 1907	
Services	Limit	Additional Services	Limit
Method B	\$10,500 - HUC	Method B	
Method B	\$14,000 - HUC		1
Method B	\$5,000 - HUC		ł
Method B	\$2,100 - HUC		
Method A	\$104,500	Method B	
Method B	\$53,000	Method B	
	Method B Method B Method B Method B Method A	Method B \$10,500 - HUC Method B \$14,000 - HUC Method B \$5,000 - HUC Method B \$2,100 - HUC Method A \$104,500	Method B \$10,500 - HUC Method B Method B \$14,000 - HUC Method B \$5,000 - HUC Method B \$2,100 - HUC Method A \$104,500 Method B

3.2 If, during the term of this Agreement, additional services are required of the ENGINEER other than those specified herein above, or changes in the work become necessary or desirable, the OWNER may order, in writing, the ENGINEER to perform such services or make such changes. If the ENGINEER is of the opinion the work he has been directed to perform is beyond the scope of services of this Agreement and constitutes extra work, the ENGINEER shall, within ten days, notify the OWNER, in writing, and receive approval from the OWNER, in writing, and receive approval from the OWNER prior to performing such work. In the event the OWNER determines that such work does constitute extra work, additional time for completion shall be given and payment for the additional work shall be in accordance with the following hourly rates of pay:

Principals Professional E									ē												\$150
Professional E	Engir	ne	er				ě														\$130
Graduate Eng	ineer	٠.							6.					٠							\$ 85
																					\$ 50
Inspection				•	٠	•	•00			٠			99	:							\$ 50
Draftsmen					•::			•				•									\$ 65
Clerical											•								•		\$ 30
3-man Survey	Cre	W				•			•		•										\$110
4-man Survey	Cre	W		•	٠		•	•	•							٠	•	•			\$110

3.3 The ENGINEER shall be paid for general supervision beyond a reasonable time limit established in each construction contract, said payment to be made in an amount mutually agreeable between the OWNER and the ENGINEER before such extra supervision is performed.

SECTION IV - GENERAL CONSIDERATIONS

- 4.1 Original notes, estimates, and reports shall remain in property of the ENGINEER. "Mylar" and digital format (TDOT Standard *.dgn, 3.5" Diskette or Rewritable Optical Disk Storage) "As-Built" drawings shall be turned over to the OWNER.
- 4.2 It is mutually agreed that the ENGINEER shall perform engineering services for each increment only as funds become available for the total cost of that increment. The Engineer shall receive written authority from the OWNER to proceed with the engineering services for each increment of work as monies become available to defray costs of same. The OWNER shall not be liable to the ENGINEER for engineering services which are performed prior to the issuance of such written authority.
- 4.3 The ENGINEER shall indemnify, keep and save harmless the OWNER, its agents, officials and employees, against all suite or claims that may be based on any injury to persons or property that is the result of an error, omission or negligent act of the ENGINEER or any person employed by the ENGINEER.

- 4.4 The OWNER shall have the right to abandon this contract or to amend its project at any time, such action shall in no event be deemed a breach of contract. The OWNER has the right to terminate this Agreement at its pleasure and make settlement with the ENGINEER upon an equitable basis after notice to proceed has been given. The value of the work performed by the ENGINEER prior to such termination of this Agreement shall be determined. In determining the value of the work performed the OWNER shall consider the following:
 - A. The ratio of the amount of work performed by the ENGINEER prior to the termination of the Agreement to the total amount of work contemplated by this Agreement, less any payments previously made.
 - B. The amount of the expense to which the ENGINEER is put in performing the work to the termination in proportion to the amount of expense to which the ENGINEER would have been put had he been allowed to complete the total work contemplated by the Agreement, less any payments previously made. In determining the value of the work performed by the ENGINEER prior to the termination, no consideration will be given to profit which the ENGINEER might have made on the uncompleted portion of the work. If the termination is brought about as a result of unsatisfactory performance on the part of the ENGINEER, the value of the work performed by the ENGINEER prior to termination shall be fixed solely on the ratio of the amount of work contemplated by this Agreement.

4.5 The OWNER and ENGINEER each binds himself, his partners, successors, executors, administrators and assigns to the other party to this Agreement, and to the partners, successors, executors, administrators and assigns of each other party in respect of all covenants of this Agreement.

CONSULTANT:	OWNER!
Environmental & Civil Engineering Services	City of Crossville
BY:	By: Wholem in
Jartner /	MAYOR
TITLE	TITLE
6/8/10	6/8/10
DATE	DATE