

## ATTACHMENT 1

### PROJECT ASSIGNMENT SCOPE OF WORK, COST AND PROJECT SCHEDULE

Project Name: All-Weather Crossing at Los Pinos at Arroyo Hondo  
 Project Number: Project Assignment 2014-0030A-PW/PL-2  
 Project Location: Arroyo Hondo, NM

Santa Fe CR54 on Los Pinos Road at Arroyo Hondo is currently a two-lane road with an active arroyo with run off that affects the low-water crossing. During a rain event this crossing become inundated with running water and creates drainage issues. The County issued a request for interest or proposals through a Letter of Interest dated February 15, 2017. Louis Berger, Inc.'s (Engineer) response was reviewed and determined to be the most responsive to the County's need under the terms and conditions and compensation agreed under on-call engineering Agreement No. 2014-0030A-PW/PL. This is Project Assignment No. 2014-2014-0030-A-PW/PL-2 to the Engineer under on-call Agreement No. 2014-0030A-PW/PL.

#### SCOPE OF WORK

- A. **Basic Services:** The project includes engineering design and related services. Engineer will complete Phase 1, Study and Report services (Project Coordination, Data Collection, Site Investigations, Hydrology Analysis, Hydraulic Analysis, Report preparation, Schematic Drainage Plan, Feasibility Estimate of Probable Construction Cost); Phase 2, Preliminary Design (Coordination, Subsurface Utility Designation, Preliminary Design Plans, and Quality Control/ Quality Assurance Review); Phase 3, Final Design (Coordination, Public Involvement, ROW mapping, Final Design Plans, Construction Bid Documents, Control/ Quality Assurance Review, Conditional Letter of Map Revision [CLOMR]), Phase 4, Bidding; Phase 5, Construction Services and Phase 6, Post Construction/ Project Closeout.
- B. **Additional Services:** Additional Services. Engineer's Additional Services will be performed in Phases 1 (Study Phase), 3 (Final Design Phase) and 6 (Post Construction) as indicated above. A. Engineer's Basic and Additional Services are more fully described in the attached correspondence dated March 30, 2017, from the Engineer to the County.
- C. **Project Assignment Schedule and Costs** (Costs stated below are consistent with costs and rates indicated in Exhibit A of Agreement No. 2014-0030A-PW/PL.

| BASIC SERVICES  |    | COST        | COMPLETION DATE |
|---|----|-------------|-----------------|
| Phase 1, Study Phase<br>(includes est. direct expenses) | 8% | \$ 7,213.44 | 10 weeks        |

|  |             |   |         |
|--|-------------|---|---------|
| Phase 2, Preliminary Design<br>(includes est. direct expenses) | 31%         | \$ 29,784.40                              | 8 weeks |
| Phase 3, Final Design<br>(includes est. direct expenses)       | 42%         | \$ 40,969.20                              | 8 weeks |
| Phase 4, Bidding<br>(includes est. direct expenses)            | 6%          | \$ 5,572.64                               | TBD     |
| Phase 5, Construction Phase<br>(includes est. direct expenses) | 12%         | \$ 11,761.68                              | TBD     |
| Phase 6, Post Construction                                     | 2%          | \$ 1,678.20                               | TBD     |
| <b>Total for Basic Services:</b>                               | <b>100%</b> | <b>\$ 96,979.56 , exclusive of NM grt</b> |         |

**ADDITIONAL SERVICES:**

|  |              |
|--|--------------|
| Phase 1, Study Phase<br>(includes Consultants) | \$ 47,256.85 |
| Phase 2, Preliminary Design                    | \$ 4,500.00  |
| Phase 3, Final Design                          | \$ 10,367.72 |
| Phase 6, Post Construction                     | \$ 8,479.88  |

**Total for Basic Services and Additional Services: \$ 167,584.01, exclusive of NM grt**  
**(Contract sum of this Project Assignment)**

**OWNER – SANTA FE COUNTY**

  
 Katherine Miller  
 Santa Fe County Manager

5-30-17  
 Date

Approved as to form:

  
 Gregory S. Shaffer  
 Santa Fe County Attorney

5-18-17  
 Date

Finance Department

Don Moya  
Don D. Moya  
Finance Director

5-23-17  
Date

ENGINEER

Richard K. Rotto  
(signature)

5/25/2017  
Date

Richard K. Rotto, Manager, NM  
(print name and title)



Finance Department

Don Moya  
Don D. Moya  
Finance Director

5-23-17  
Date

**ENGINEER**

\_\_\_\_\_  
(signature)

\_\_\_\_\_  
Date

\_\_\_\_\_  
(print name and title)

## EXHIBIT F CONSULTANT LIST

PROJECT NAME: All-Weather Crossing at Los Pinos at Arroyo Hondo

CONTRACT NO: Project Assignment No. 2014-0030-A-PW/PL-2 under Agreement No. 2014-0030A-PW/PL

|   |  |
|---|--|
| <u>CIVIL ENGINEERING SERVICES</u><br>Company Name:<br>Consultant Name:<br>Address:<br><br>Ph. No.:<br>Fax No.:<br>E-mail:                               | <u>ENVIRONMENTAL SERVICES</u><br>Company Name: Pathfinder Environmental LLC<br>Consultant Name:<br>Address: 1800 Pecos Trail, Suite E, Santa Fe, NM 87505<br><br>Ph. No.:<br>Fax No.:<br>E-mail:                           |
| <u>DESIGN/BRANDING &amp; SIGNAGE</u><br>Company Name: Design Office<br>Consultant Name: Claudia Horn<br>Address:<br><br>Ph. No.:<br>Fax No.:<br>E-mail: | <u>SURVEYING/MAPPING SERVICES</u><br>Company Name: CobbFendley<br>Consultant Name:<br>Address: 3820 Academy Pkwy Albuquerque, NM 87109<br><br>Ph. No.: (505) 508-0786<br>Fax No.: (505) 508-0837<br>E-mail: comfendley.com |
| <u>STRUCTURAL ENGINEERING SERVICES</u><br>Company Name:<br>Consultant Name:<br>Address:<br><br>Ph. No.:<br>Fax No.:<br>E-mail:                          | <u>GEOTECHNICAL SERVICES</u><br>Company Name: Geo-Test, Inc.<br>Consultant Name:<br>Address: 3204 Richards Lane Santa Fe, NM 87507<br><br>Ph. No.: (505) 471-1101<br>Fax No.: (505) 471-2245<br>E-mail:                    |

March 30, 2017

Maricela C. Martinez  
mcmartinez@santafecountynm.gov  
Procurement Specialist Senior  
142 W. Palace Ave., Second Floor  
102 Grant Ave., P.O. Box 276  
Santa Fe, NM 87504-0276

TRANSMITTED VIA EMAIL

**Re: LOI Engineering Services to Address Drainage Design for Santa Fe County CR54 at Los Pinos Road All-Weather Crossing at Arroyo Hondo; Agreement No. 2014-0030-PW/PL**

Dear Ms. Martinez:

This letter is our proposal to provide basic civil engineering services for Phase I, II, III, IV, V and VI of the above referenced project in response to our scoping meetings. The following summarizes the proposed scope of engineering services and related fees.

#### **PROJECT APPROACH:**

The subject project has not been previously studied. Information on available construction funding has not yet been identified. The scope of work will be administered in accordance with Louis Berger's project approach to meet the purpose and need developed for the project. A detailed outline of the scope of work includes the following tasks and activities.

#### **1.0 PHASE I – STUDY AND REPORT:**

Our approach to the study phase is based on the following framework.

- ✓ Provide a list of data to be requested from FEMA by Santa Fe County to obtain FEMA's Effective Model (HEC-RAS) from the FEMA repository and all pertinent data from the Community Map Repository.
- ✓ Using FEMA's hydrologic data develop additional flood frequencies, if not included in FEMA's effective model.
- ✓ Prepare the existing condition hydraulic model.
- ✓ Evaluate the capacity and equivalent flood frequency of the existing drainage structures in the existing condition hydraulic model.
- ✓ Develop conceptual drainage solutions.
- ✓ Consult with Santa Fe County to discuss project design criteria and preliminary results of the hydraulic model.
- ✓ Complete the hydraulic analysis and prepare the drainage recommendations
- ✓ Prepare the PER Report (Drainage Report) documenting the hydrology, hydraulic analysis and recommendations.
- ✓ Prepare a schematic drainage plan and estimate the probable project costs.

The following tasks and activities will be administered in accordance with Louis Berger's approach to meet the purpose and need developed for the project.

- 1.1 **Project Coordination** – Louis Berger will coordinate all project activities with Santa Fe County through its designated Project Manager to establish key project elements including: project purpose and need; existing records and survey data; data collection; analysis methodology and criteria; and report requirements.
- 1.2 **Data Collection/Site Investigations** – Louis Berger will perform data collection in both field and office based environments. Louis Berger's subconsultant Cobb Fendley and Associates will develop a project specific topographic survey. Louis Berger will interview Santa Fe County maintenance staff and inquisitive residents who may approach us at the time of the project site visit.
- 1.3 **Hydrology Analysis** – Since the project lies within a FEMA Floodplain Zone AE, all work must be based upon FEMA's effective floodplain HEC-RAS model and the 2014 Flood Insurance Study. The model will be updated as appropriate using approved technology and computer software in hydrologic modeling. Louis Berger will apply its experience to analyze and evaluate the watershed and tributaries at concentration points for existing and proposed structures.
- 1.4 **Hydraulic Analysis** – The latest version of the US Army Corps of Engineers (USACE) HEC-RAS program will be utilized to evaluate preliminary channel hydraulics along the road and to estimate the anticipated water surface elevations in respect to roadway profile. The current FEMA effective model will be modified to develop the proposed corrected effective model. The analysis will be performed in accordance with NMDOT's Drainage Manual, Volume 2-Hydraulics if no other methodology or procedure is specified by Santa Fe County at the beginning of the project. Louis Berger will consider and compare recommended hydraulic solutions, including sizes and number of structures, channel geometry, materials, headwater requirements, backwater effects, right-of-way constraints, and velocities. The results of the analysis and comparison will be shared with Santa Fe County for consideration, ultimately producing the best possible alternative.
- 1.5 **Report Preparation** – A PER (Drainage Report) will be prepared to include all supportive data and findings from the drainage study. The report will present drainage patterns that impact the project and appropriate recommendations to adequately manage the flows. The report will document the hydrologic parameters used by FEMA to develop peak runoff rates for the drainage basins tributary to the project. Run-off flow rates will be developed for all appropriate storm event frequencies as necessary to design the hydraulic structures. The report will contain detailed hydrologic and hydraulic summaries of the evaluation of the watershed with supporting calculations provided within appendices. Analyses will be conducted using established methodologies outlined above.
- 1.6 **Schematic Drainage Plan** – Louis Berger will prepare a Drainage Base Map of proposed drainage improvements based upon the result of the drainage study available in both Adobe PDF and AutoCAD formats.
- 1.7 **Feasibility Estimate of Probable Construction Costs** – Louis Berger will perform an order of magnitude feasibility estimate of probable construction costs. The estimate will be based upon estimated quantities for major pay items using Bid Express, NMDOT bid tab analysis and Average Unit Bid Prices published by NMDOT with adjustments based upon our estimating experience and engineering judgment.



**2.0 PHASE II – PRELIMINARY DESIGN:**

- 2.1 COORDINATION - This work shall consist of the coordination efforts necessary to accomplish the work required by this contract. These duties during this phase are anticipated to include:

- 1.1.1 Being the focal point for the flow of all project activity.
- 1.1.2 Scheduling all design review meetings.
- 1.1.3 Distribution of preliminary design plans and documents.
- 1.1.4 Preparing plan review meeting minutes.

- 2.2 SUBSURFACE UTILITY DESIGNATION – The subsurface utility engineering (SUE) will be provided by Cobb Fendley and Associates in accordance with their proposal (attached).

This work will include the following services, if necessary:

- 2.2.1 Schedule, Host, and document a utility coordination meeting
- 2.2.2 Request records from utility owners

- 2.3 PRELIMINARY DESIGN PLANS – All construction drawings shall be generated utilizing Autocad Land Desktop Software (Civil 3D). The construction documents shall be prepared in accordance with current NMDOT standards for general content and shall include the following services:

- 2.3.1 Generate Preliminary Design Model
  - 2.3.1.1 Electronically Transverse “Existing” Centerline Geometry
  - 2.3.1.2 Match “Existing” geometry to mapping
  - 2.3.1.3 Generate Typical Sections
  - 2.3.1.4 Develop proposed horizontal alignment
  - 2.3.1.5 Develop proposed vertical profile
  - 2.3.1.6 Create 3D Model
- 2.3.2 Generate Preliminary Plan Sheets
  - 2.3.2.1 Cover Sheet
  - 2.3.2.2 Vicinity map
  - 2.3.2.3 Drawing Index
  - 2.3.2.4 Summary of Quantities
  - 2.3.2.5 General Notes
  - 2.3.2.6 Typical Section
  - 2.3.2.7 Miscellaneous Details
  - 2.3.2.8 Surfacing Schedule
  - 2.3.2.9 Estimates Structure Quantities (ESQ's)
  - 2.3.2.10 Miscellaneous Quantities
  - 2.3.2.11 Plan & Profile Sheet
  - 2.3.2.12 Turnout Profiles
  - 2.3.2.13 Construction Signing & Striping
  - 2.3.2.14 Permanent Signing & Striping
  - 2.3.2.15 Structure Placement Sections
  - 2.3.2.16 Cross-Sections
- 2.3.3 Preliminary Engineers' Estimate
- 2.3.4 Submit Preliminary Design Package

2.4 QUALITY CONTROL / QUALITY ASSURANCE REVIEW

3.0 **PHASE III - FINAL DESIGN:**

3.1 COORDINATION – This work shall include the continued efforts as described in Section 2.1 above.

3.2 PUBLIC INVOLVEMENT – Louis Berger, together with subconsultant Pathfinder Environmental, will be responsible for advertising, facilitating, and documenting one (1) public information meeting for the project if needed during Phase III. If a meeting is held, Louis Berger will facilitate the meeting and provide visual displays. This work will include the following services to technical support provide :

3.2.1 Presentation Display Boards (2)

3.2.2 Attend Public Meeting

3.3 RIGHT-OF-WAY MAPPING – Not included in the scope of work.

***NOTE: Appraisals and right of way acquisition services are not included in this proposal.***

3.4 FINAL DESIGN PLANS – All construction drawings shall be generated utilizing Autocad Land Desktop Software (Civil 3D). The construction documents shall be prepared in accordance with current NMDOT standards for general content and shall include the following services:

3.4.1 Generate Preliminary Design Model

3.4.1.1 Finalize Typical Sections

3.4.1.2 Finalize horizontal alignment

3.4.1.3 Finalize vertical profile

3.4.1.4 Finalize 3D Model

3.4.2 Generate Final Plan Sheets

3.4.2.1 Cover Sheet

3.4.2.2 Vicinity map

3.4.2.3 Drawing Index

3.4.2.4 Summary of Quantities

3.4.2.5 General Notes

3.4.2.6 Typical Section

3.4.2.7 Miscellaneous Details

3.4.2.8 Surfacing Schedule

3.4.2.9 Estimates Structure Quantities (ESQ's)

3.4.2.10 Miscellaneous Quantities

3.4.2.11 Plan & Profile Sheet

3.4.2.12 Drainage Plan

3.4.2.13 Turnout Profiles

3.4.2.14 Construction Signing & Striping

3.4.2.15 Permanent Signing & Striping

3.4.2.16 Structure Placement Sections

3.4.2.17 Cross-Sections

3.4.3 Final Engineers' Estimate

3.4.4 Submit one (1) Final Design Package

3.5 CONSTRUCTION BID DOCUMENTS – This work shall include the compilation of the following documents:

- 3.5.1 Final Construction Plans
- 3.5.2 Final Engineer's Estimate
- 3.5.3 Standard Specifications (2014 NMDOT Standard Specifications)
- 3.5.4 Special Provisions
- 3.5.5 Notice to Contractors

3.6 QUALITY CONTROL / QUALITY ASSURANCE REVIEW

3.7 CONDITIONAL LETTER OF MAP REVISION (CLOMR) - Prepare a Conditional Letter of Map Revision (CLOMR) application for Santa Fe County's Community Floodplain Administrator. Provide technical support during FEMA's review and recommendations to Santa Fe County in response to comments received. FEMA review request fees are to be paid directly by Santa Fe County.

*NOTE: Property owner notifications to be provided by Santa Fe County.*

*NOTE: FEMA review request fees are not included in this proposal.*

4.0 **PHASE IV – BIDDING**

- 4.1 This work shall include the following lump sum services during the bidding and negotiation phase:
  - 4.1.1 Review the project Contract Book (IFB) prepared by Santa Fe County
  - 4.1.2 Generate Bid Tabulation Spreadsheet
  - 4.1.3 Provide recommendation to award letter

5.0 **PHASE V – CONSTRUCTION SERVICES**

- 5.1 This work shall include providing engineering services during the construction phase:
  - 5.1.1 Shop Drawing review
  - 5.1.2 Evaluate Contractor suggested material substitutions
  - 5.1.3 Consider Contractor's suggestions for modification(s) to the construction plan and notify Contractor of decisions made
  - 5.1.4 Issue clarifications and interpretations of the contract documents as appropriate to maintain orderly completion of the Contractor's work.

6.0 **PHASE VI – POST CONSTRUCTION/PROJECT CLOSEOUT SERVICES**

6.1 **LETTER OF MAP REVISION (LOMR)**

- 6.1.1 Prepare a Letter of Map Revision (LOMR) application for Santa Fe County's Community Floodplain Administrator. Provide technical support during FEMA's review and recommendations to Santa Fe County in response to comments received. FEMA review request fees are to be paid directly by Santa Fe County.

*NOTE: As-Built Survey for LOMR to be provided by Santa Fe County.*

*NOTE: FEMA review request fees are not included in this proposal.*

6.2 **11 MONTH WARRANTY INSPECTION**

**GENERAL ASSUMPTIONS:** Following the scoping discussion with Santa Fe County (SFC) representatives, the following assumptions have been made as the basis of this proposal:

1. No construction budget or MCCC has been determined or will be used throughout the design.
2. The project is not suspended (shelved), phased, or bid more than once.
3. A pavement design is excluded from the scope of work. As a result, Louis Berger will incorporate a surfacing thickness of 3" Hot Mix Asphalt over 6" Base Course, or other section, as directed by Santa Fe County;
4. Property ownership, right-of-way mapping, title reports, property appraisals and acquisition services are not included;
5. The structure type assumed for the level of effort reflected in this proposal is a standard cast-in-place concrete box culvert (CBC), such as a 5-12' x 8' CBC, with skewed concrete headwalls and wingwalls. Design of other types of structures, including bridge type structures, or consideration of other types of methods, such as accelerated bridge construction, have not been evaluated in this proposal;
6. All plan review submittals will be made electronically on 11"x17" sheets in PDF format;
7. The proposal excludes all permit fees.
8. Any service(s) or work not explicitly noted herein is excluded from the scope of services.

**PROJECT SCHEDULE:** Upon receipt of Notice to proceed, Louis Berger shall commence work as detailed in the Scope of Work above and shall complete the services in a timeframe agreed to by both Louis Berger and Santa Fe County.

**FEE AND BILLING:** An itemized man-hour estimate and proposed budget, exclusive of gross receipts tax, is provided herein. Engineering services will be invoiced monthly based on a percent complete on a LUMP SUM basis.

**CLOSING:**

Questions and/or clarifications regarding this proposal should be referred to me at 505-395-2190 or [ron@louisberger.com](mailto:ron@louisberger.com). We appreciate the opportunity to be considered for this assignment, and look forward to working with Santa Fe County.

Respectfully Submitted,

Richard K. Raito, P.E., M.S.  
Manager, New Mexico

Fee Proposal

May 10, 2017

| Louis Berger                          | Loaded Rate<br>(Hourly) | Phase 1<br>Study Phase |              | Phase 2<br>Preliminary Design |              | Phase 3<br>Final Design |              | Phase 4<br>Bidding |             | Phase 5<br>Construction Phase |              | Phase 6<br>Post Construction |               |
|---------------------------------------|-------------------------|------------------------|--------------|-------------------------------|--------------|-------------------------|--------------|--------------------|-------------|-------------------------------|--------------|------------------------------|---------------|
|                                       |                         | Hours                  | Cost         | Hours                         | Cost         | Hours                   | Cost         | Hours              | Cost        | Hours                         | Cost         | Hours                        | Cost          |
| Basic Services                        |                         |                        |              |                               |              |                         |              |                    |             |                               |              |                              |               |
| Project Manager I                     | \$ 127.83               | 20                     | \$ 2,556.60  | 56                            | \$ 7,158.48  | 80                      | \$ 10,226.40 | 24                 | \$ 3,067.92 | 16                            | \$ 2,045.28  | 4                            | \$ 511.32     |
| Engineer II                           | \$ 140.92               | 16                     | \$ 2,254.72  | 46                            | \$ 6,482.32  | 108                     | \$ 15,219.36 | 16                 | \$ 2,254.72 | 24                            | \$ 3,382.08  | 4                            | \$ 563.68     |
| Engineer III                          | \$ 176.65               | 4                      | \$ 706.60    | 8                             | \$ 1,413.20  | 12                      | \$ 2,119.80  | 0                  | \$ -        | 0                             | \$ -         | 0                            | \$ -          |
| Structural Designer                   | \$ 76.80                | 0                      | \$ -         | 50                            | \$ 3,840.00  | 2                       | \$ 153.60    | 0                  | \$ -        | 24                            | \$ 1,843.20  | 0                            | \$ -          |
| CADD Operator I                       | \$ 76.18                | 0                      | \$ -         | 88                            | \$ 6,703.84  | 108                     | \$ 8,227.44  | 0                  | \$ -        | 24                            | \$ 1,828.32  | 0                            | \$ -          |
| Field Technician II                   | \$ 95.73                | 0                      | \$ -         | 0                             | \$ -         | 0                       | \$ -         | 0                  | \$ -        | 0                             | \$ -         | 0                            | \$ -          |
| Hydrologist I                         | \$ 85.18                | 4                      | \$ 340.72    | 12                            | \$ 1,022.16  | 10                      | \$ 851.80    | 0                  | \$ -        | 0                             | \$ -         | 0                            | \$ -          |
| Hydrologist III                       | \$ 150.80               | 6                      | \$ 904.80    | 18                            | \$ 2,714.40  | 26                      | \$ 3,920.80  | 0                  | \$ -        | 16                            | \$ 2,412.60  | 4                            | \$ 603.20     |
| Sub-Total                             |                         | 50                     | \$ 6,763.44  | 278                           | \$ 29,334.40 | 346                     | \$ 40,719.20 | 40                 | \$ 5,322.64 | 104                           | \$ 11,511.68 | 12                           | \$ 1,678.20   |
| Additional Services                   |                         |                        |              |                               |              |                         |              |                    |             |                               |              |                              |               |
| Project Manager I                     | \$ 127.83               | 10                     | \$ 1,278.30  |                               | \$ -         | 4                       | \$ 511.32    |                    | \$ -        |                               | \$ -         | 4                            | \$ 511.32     |
| Engineer II                           | \$ 140.92               | 26                     | \$ 3,663.92  |                               | \$ -         | 16                      | \$ 2,254.72  |                    | \$ -        |                               | \$ -         | 16                           | \$ 2,254.72   |
| Engineer III                          | \$ 176.65               | 4                      | \$ 706.60    |                               | \$ -         | 8                       | \$ 1,413.20  |                    | \$ -        |                               | \$ -         | 8                            | \$ 1,413.20   |
| Structural Designer                   | \$ 76.80                | 0                      | \$ -         |                               | \$ -         | 0                       | \$ -         |                    | \$ -        |                               | \$ -         | 0                            | \$ -          |
| CADD Operator I                       | \$ 76.18                | 32                     | \$ 2,437.76  |                               | \$ -         | 0                       | \$ -         |                    | \$ -        |                               | \$ -         | 0                            | \$ -          |
| Field Technician II                   | \$ 95.73                | 0                      | \$ -         |                               | \$ -         | 0                       | \$ -         |                    | \$ -        |                               | \$ -         | 0                            | \$ -          |
| Hydrologist I                         | \$ 85.18                | 48                     | \$ 4,088.64  |                               | \$ -         | 16                      | \$ 1,362.88  |                    | \$ -        |                               | \$ -         | 8                            | \$ 681.44     |
| Hydrologist III                       | \$ 150.80               | 66                     | \$ 9,952.80  |                               | \$ -         | 32                      | \$ 4,825.60  |                    | \$ -        |                               | \$ -         | 24                           | \$ 3,619.20   |
| Sub-Total                             |                         | 186                    | \$ 22,128.02 | 0                             | \$ -         | 76                      | \$ 10,367.72 | 0                  | \$ -        | 0                             | \$ -         | 60                           | \$ 8,478.88   |
| Sub Consultants (Additional Services) |                         |                        |              |                               |              |                         |              |                    |             |                               |              |                              |               |
| Cobb Fendley & Associates             |                         | \$ 14,415.00           |              |                               | \$ -         |                         |              |                    |             |                               |              |                              | TBD           |
| Pathfinder Environmental, LLC         |                         | \$ 10,713.83           |              |                               |              |                         |              |                    |             |                               |              |                              | TBD           |
| Geo-Test, Inc.                        |                         |                        | \$ 4,500.00  |                               |              |                         |              |                    |             |                               |              |                              | TBD           |
| Sub-Total                             |                         | \$ 25,128.83           |              | \$ 4,500.00                   |              | \$ -                    |              | \$ -               |             | \$ -                          |              |                              | \$ -          |
| Estimated Direct Expenses             |                         |                        |              |                               |              |                         |              |                    |             |                               |              |                              |               |
| Copying / Expendables                 |                         | \$ 450.00              |              | \$ 450.00                     |              | \$ 250.00               |              | \$ 250.00          |             | \$ 250.00                     |              |                              |               |
| FEMA - CLOMR Application Fee          |                         |                        |              |                               |              | TBD                     |              |                    |             |                               |              |                              |               |
| FEMA - LOMR Application Fee           |                         |                        |              |                               |              |                         |              |                    |             |                               |              |                              |               |
| Post Construction Survey              |                         |                        |              |                               |              |                         |              |                    |             |                               |              |                              |               |
| Sub-Total                             |                         | \$ 450.00              |              | \$ 450.00                     |              | \$ 250.00               |              | \$ 250.00          |             | \$ 250.00                     |              |                              |               |
| Phase(s) Total                        |                         | \$ 54,470.29           |              | \$ 34,284.40                  |              | \$ 51,336.92            |              | \$ 5,572.64        |             | \$ 11,761.68                  |              |                              | \$ 10,156.08  |
| Accumulative Total                    |                         | \$ 54,470.29           |              | \$ 88,754.69                  |              | \$ 140,091.61           |              | \$ 145,664.25      |             | \$ 157,425.93                 |              |                              | \$ 167,584.01 |

Sub-Total Basic Services (Ph 1A, 2, 3A, 4, 5, 6A) \$ 96,979.56  
 al Additional Services (Ph 1B, 3B, 6B, Surveying, SUE, Geotech) \$ 70,604.45  
 Total Basic and Additional Services \$ 167,584.01  
 NMGR @ 8.3125% \$ 13,930.42  
 Total Basic and Additional Services with NMGR \$ 181,514.43

Man-Hour Proposal

Santa Fe County Public Works Department  
CR-54 Los Pinos Road All Weather Crossing

| TASK NUMBER | TASK ACTIVITIES FOR BASIC SERVICES                 | Estimated Work-Hours |             |              |              |                 |               |               |                 | Totals |
|-------------|--|----------------------|-------------|--------------|--------------|-----------------|---------------|---------------|-----------------|--------|
|             |  | Project Manager I    | Engineer II | Engineer III | Sr. Designer | CADD Operator I | Field Tech II | Hydrologist I | Hydrologist III |        |
| 1A          | Study and Report Phase - Basic Services            |                      |             |              |              |                 |               |               |                 |        |
|             | 1.1 Coordination                                   |                      |             |              |              |                 |               |               |                 |        |
|             | Project Coordination and FEMA Data Request         | 8                    | 2           |              |              |                 |               | 2             | 2               | 14     |
|             | Conduct Site Review                                | 4                    | 4           |              |              |                 |               | 2             | 2               | 12     |
|             | Feasibility Estimate of Probable Construction Cost | 8                    | 8           |              |              |                 |               |               |                 | 16     |
|             | Quality Control Plan, Quality Assurance Review     |                      | 2           | 4            |              |                 |               |               | 2               | 8      |
|             | Sub-Total  | 20                   | 16          | 4            | 0            | 0               | 0             | 4             | 6               | 50     |
|             | Study and Report Phase - Basic Services            | 20                   | 16          | 4            | 0            | 0               | 0             | 4             | 6               | 50     |
| 1B          | Study and Report Phase - Additional Services       |                      |             |              |              |                 |               |               |                 |        |
|             | 1.1 Drainage Study                                 |                      |             |              |              |                 |               |               |                 |        |
|             | Perform Hydrologic Analysis                        |                      | 2           |              |              |                 |               | 16            | 16              | 34     |
|             | Hydraulic Analysis Modeling (HEC-RAS)              |                      | 2           |              |              |                 |               | 16            | 16              | 34     |
|             | Hydraulic Structure Recommendation (Type and Size) |                      | 2           |              |              |                 |               | 8             | 8               | 18     |
|             | Prepare Drainage Report (PER)                      |                      | 2           |              |              |                 |               | 4             | 16              | 22     |
|             | Conceptual Design (Plan & Profile)                 | 8                    | 12          |              |              | 16              |               |               | 4               | 40     |
|             | Schematic Drainage Plan                            | 2                    | 4           |              |              | 16              |               |               | 4               | 30     |
|             | Quality Control Plan, Quality Assurance Review     |                      | 2           | 4            |              |                 |               |               | 2               | 8      |
|             | Sub-Total  | 10                   | 28          | 4            | 0            | 32              | 0             | 48            | 66              | 188    |
|             | Study and Report Phase - Additional Services       | 10                   | 28          | 4            | 0            | 32              | 0             | 48            | 66              | 186    |



| TASK NUMBER | TASK ACTIVITIES FOR BASIC SERVICES  | Estimated Work-Hours |                |              |              |                 |               |               |                 |  |  | Totals         |
|-------------|---|----------------------|----------------|--------------|--------------|-----------------|---------------|---------------|-----------------|--|--|----------------|
|             |   | Project Manager I    | Engineer II    | Engineer III | Sr. Designer | CADD Operator I | Field Tech II | Hydrologist I | Hydrologist III |  |  |                |
| 3A          | Final Design Phase - Basic Services   |                      |                |              |              |                 |               |               |                 |  |  |                |
|             | 3.1 Coordination  | 16                   | 8              |              |              |                 |               |               |                 |  |  | 24             |
|             | Sub-Total   | 16                   | 8              |              |              |                 |               |               |                 |  |  | 24             |
|             | 3.2 Public Involvement  | 16                   | 4              |              |              | 16              |               | 2             |                 |  |  | 38             |
|             | Sub-Total   | 16                   | 4              |              |              | 16              |               | 2             |                 |  |  | 38             |
|             | 3.3 Right of Way Mapping<br>NOT INCLUDED IN THIS PROPOSAL   |                      |                |              |              |                 |               |               |                 |  |  |                |
|             | Sub-Total   | 0                    | 0              |              |              |                 |               |               |                 |  |  | 0              |
|             | 3.4 Final Design Plans<br>Roadway/ Traffic Control Signing/ Striping<br>Drainage/ TESCO<br>Structural | 32                   | 20<br>20<br>32 |              |              | 24<br>20<br>40  |               | 8             | 24              |  |  | 76<br>72<br>72 |
|             | Sub-Total   | 32                   | 72             |              |              | 84              |               | 8             | 24              |  |  | 220            |
|             | 3.5 Construction Bid Documents  | 16                   | 16             |              |              | 8               |               |               |                 |  |  | 40             |
|             | Sub-Total   | 16                   | 16             |              |              | 8               |               |               |                 |  |  | 40             |
|             | 3.6 Quality Control / Quality Assurance (QA/QC)   |                      | 8              | 12           | 2            |                 |               |               | 2               |  |  | 24             |
|             | Sub-Total   | 0                    | 8              | 12           | 2            | 0               |               | 0             | 2               |  |  | 24             |
|             | Final Design Phase - Additional Services  | 80                   | 108            | 12           | 2            | 108             |               | 10            | 28              |  |  | 346            |
|             | 3.7 Conditional Letter of Map Revision (CLOMR)<br>3.7 Conditional Letter of Map Revision (CLOMR)      | 4                    | 16             | 8            |              |                 |               | 16            | 32              |  |  | 76             |
|             | Sub-Total   | 4                    | 16             | 8            |              |                 |               | 16            | 32              |  |  | 76             |
|             | Final Design Phase - Additional Services  | 4                    | 16             | 8            |              |                 |               | 16            | 32              |  |  | 76             |
|             | Sub-Total   | 4                    | 16             | 8            |              |                 |               | 16            | 32              |  |  | 76             |



| TASK<br>NUMBER | TASK ACTIVITIES FOR BASIC SERVICES | Estimated Work-Hours |             |              |              |                 |               |               |                 |
|----------------|------------------------------------|----------------------|-------------|--------------|--------------|-----------------|---------------|---------------|-----------------|
|                |                                    | Project Manager I    | Engineer II | Engineer III | Sr. Designer | CADD Operator I | Field Tech II | Hydrologist I | Hydrologist III |
| 4              | Bidding Phase                      |                      |             |              |              |                 |               |               |                 |
|                | 4.1 Bidding and Negotiation        |                      |             |              |              |                 |               |               |                 |
|                |                                    | 24                   | 16          |              |              |                 |               |               |                 |
|                | Sub-Total                          | 24                   | 16          | 0            | 0            | 0               | 0             | 0             | 0               |
| 5              | Construction Phase                 |                      |             |              |              |                 |               |               |                 |
|                | 5.1 Construction Engineering       |                      |             |              |              |                 |               |               |                 |
|                |                                    | 16                   | 24          |              | 24           |                 |               |               |                 |
|                | Sub-Total                          | 16                   | 24          | 0            | 24           |                 |               |               |                 |
|                | Construction Phase                 |                      |             |              |              |                 |               |               |                 |
|                |                                    | 16                   | 24          | 0            | 24           |                 |               |               |                 |
|                |                                    | 16                   | 24          | 0            | 24           |                 |               |               |                 |
|                | Sub-Total                          | 16                   | 24          | 0            | 24           |                 |               |               |                 |
| Totals         |                                    |                      |             |              |              |                 |               |               |                 |

Man-Hour Proposal

Santa Fe County Public Works Department  
CR-54 Los Pinos Road All Weather Crossing

| TASK NUMBER | TASK ACTIVITIES FOR BASIC SERVICES              | Estimated Work-Hours |             |              |              |                 |               |               |                 | Totals |
|-------------|---|----------------------|-------------|--------------|--------------|-----------------|---------------|---------------|-----------------|--------|
|             |   | Project Manager I    | Engineer II | Engineer III | Sr. Designer | CADD Operator I | Field Tech II | Hydrologist I | Hydrologist III |        |
| 6A          | Basic Service - 11 month Warranty Inspection    |                      |             |              |              |                 |               |               |                 |        |
|             | 6.1 11 Month Warranty Inspection                | 4                    | 4           |              |              |                 |               |               | 4               | 12     |
|             | 11 Month Warranty Inspection                    | 4                    | 4           |              |              |                 |               |               | 4               | 12     |
|             | Sub-Total                                       | 4                    | 4           |              |              |                 |               |               | 4               | 12     |
|             | Basic Service - 11 month Warranty Inspection    |                      |             |              |              |                 |               |               |                 |        |
| 6B          | Additional Service - Post Construction Analysis |                      |             |              |              |                 |               |               |                 |        |
|             | 6.2 Prepare one (1) Letter of Map Revision      | 4                    | 16          | 8            |              |                 |               | 8             | 24              | 60     |
|             | Prepare one (1) Letter of Map Revision          | 4                    | 16          | 8            |              |                 |               | 8             | 24              | 60     |
|             | Sub-Total                                       | 4                    | 16          | 8            |              |                 |               | 8             | 24              | 60     |
|             | Additional Service - Post Construction Analysis | 4                    | 16          | 8            |              |                 |               | 8             | 24              | 60     |
|             | TOTAL LABOR HOURS                               | 214                  | 256         | 16           | 76           | 252             | 0             | 52            | 100             | 1076   |