January 24, 2017

Mr. Jason Simpson
Director of Administrative Services
City of Lake Elsinore
130 South Main Street
Lake Elsinore, CA 92530

RE: GIS Implementation Services

Spicer Consulting Group, LLC (SCG) is pleased to present this proposal for GIS implementation services for the City of Lake Elsinore (City). This proposal represents our understanding of the City's GIS needs with respect to supporting the implementation of EnerGov and the desire to expand access and use of GIS throughout the City.

For this project, we have teamed with two experienced GIS professionals who are ESRI Silver Network Partners and Certified GIS professionals. Combined, they have nearly 40 years of experience with ESRI technology with specific experience implementing enterprise GIS technology for local agencies throughout Southern California. We are confident our team can design and build a GIS system that will meet the City's immediate needs for EnerGov, and provide a solid foundation for the continued expansion of GIS technology throughout the City to support its growing development.

Project Understanding

The City of Lake Elsinore is an incorporated city in Western Riverside County, California. It was established as a city in 1888 along the shore of Lake Elsinore, a natural freshwater lake of approximately 3,000 acres. Since its inception, the City has grown from a small resort town to a rapidly growing urbanized area with a population of over 61,006 in 2016. Population change since the year 2000 has been 107.5%.

The City is approximately two-thirds undeveloped and is anticipating a major increase in building permit activity as the buildout of specific planned developments occurs. To help manage this buildout and support the City's strategic initiative for service as part of its Vision Statement, the City has started implementing EnerGov, an enterprise permitting and land management system developed by Tyler Technologies. EnerGov relies on a GIS land-base which the system interfaces with to associate permitting and land management activities with the corresponding spatial features those activities occur on (e.g. parcels, addresses, etc.).

Further, with the recent retirement of the City's GIS Analyst, the City also has no current GIS staff and many GIS data layers remain stored in various formats and locations that have been developed and assembled over time from various projects. The City's GIS environment needs to be setup so that the City can begin leveraging GIS to improve processes and support.

To help ensure that the City's GIS system is set up to facilitate a well-developed and reliable integration with EnerGov, and ensure the City is best positioned to take full advantage of all EnerGov capabilities moving forward, the City desires to implement a new GIS design and data organization schema to better support its rollout of EnerGov and enable more widespread access to GIS information and GIS services throughout the City's enterprise.

SCG understands that the City will be purchasing a Small Government Enterprise License Agreement (SGELA) from ESRI to obtain the software needed to support its EnerGov rollout and its GIS expansion efforts. Under the SGEGLA, the City further intends to setup a new server on which it will install ArcGIS Enterprise (formerly ArcGIS Server) that will host a a new enterprise geodatabase and a new data schema based on ESRI's Local Government Information Model (LGIM). Once ArcGIS Enterprise is setup and the LGIM data schema is established, the City plans to migrate selected data from its older shapefile and geodatabase sources into the LGIM schema within the new enterprise geodatabase.

We also understand that the City also intends to implement a secure ArcGIS Online Organization to facilitate the organization of maps, services, and data throughout the city enterprise. Following migration of data into the LGIM schema in its new enterprise geodatabase, the City intends to develop and publish new map and feature services to its ArcGIS Organization account for sharing use by EnerGov and other City departments. We further understand that the City's immediate need is to implement an enterprise geodatabase and ArcGIS Organization structure to support its existing EnerGov applications. Subsequent additional maps, services and applications that support additional department functions and business processes will follow, as they are prioritized.

We understand that the City's IT department will establish a new virtual server to host the pending ArcGIS Enterprise installation and geodatabase. The City will also reallocate their ArcGIS Desktop product licenses and setup one workstation for a GIS administrator and additional workstations for GIS editors.

This proposal is for setting up the City's GIS environment including the GIS Server, ArcGIS Online Organization accounts, and an administrative and editor workstation. SCG will also migrate data layers to the new ArcGIS Enterprise geodatabase that are needed to access ArcGIS Online Organization web applications and services that support the City's EnerGov platform.

Project Team

Mr. Shane Spicer will serve as Account Manager. Shane has a strong technical and professional background with municipal agencies which make him well versed with the ability to serve the best interests of the City. Shane will be the day-to-day contact for City Staff, and be responsible for maintaining the project schedules, and will work with City Staff to ensure a successful outcome of this project from beginning to end. This will include a strict adherence to the project schedule that will be developed and maintained at the project's onset.

Mr. John Donoghue will serve as Lead Analyst and Liaison with ESRI. John is a certified GIS Professional, ESRI Partner Network Silver Member, and an ESRI Certified ArcGIS Desktop Professional with 17+ years' experience providing integration, implementation, database design, and application development services and extensive experience applying GIS technologies in local, state, and tribal government; special districts, and other settings. He has also served the A/E/C industry leading GIS modeling for environmental impact analyses, conservation programs, and habitat conservation plans for many public, private and non-governmental organization projects throughout Southern California. In addition, he has lead GIS application development projects supporting airport noise mitigation projects in California and the eastern US.

Mr. Bruce Miller will serve as Project Manager on the integration process. Bruce is the founder of Miller Spatial Services, LLC, and graduated with a B.S. degree in Environmental science from the University of California, Riverside. He is certified as a Geographic Information Systems Professional (GISP) with over 20 years of professional experience in GIS within the engineering industry providing GIS services to public agencies throughout California. Mr. Miller is an ESRI Silver Network Partner and a CityWorks Partner. He has Over 10 years of project management experience and has been responsible for directing complex mapping projects addressing logistical and technical concerns. Services include database development, administration and maintenance, map creation, needs assessment, implementation and integration.

Scope of Work

Based on our understanding of the project discussed above, SCG proposes to complete following scope of work:

- ♦ Setup ArcGIS Enterprise Server and Enterprise Geodatabase
- ♦ Setup Local Government Information Model Schema
- ♦ Migrate Data Layers to LGIM Schema to Support EnerGov
- ♦ Setup ArcGIS Online Organization Account and Users
- ♦ Setup ArcGIS Online Map and Layer Services for EnerGov Integration
- ♦ Migrate Additional Secondary Layers to LGIM Schema
- ♦ Training and Ongoing Support

Task 1: Project Initiation

In this task, SCG will hold a project kickoff meeting to confirm the project requirements and scope of work. This meeting will be held at the City and should include all staff that SCG will work with. Contact information and the technical details of the project will be documented.

Deliverables:

- ♦ Meeting Notes
- ♦ Revised Scope of Work (if necessary)

Task 2: Setup GIS Server

In this task, SCG will work with the City to install and configure the following software on a new virtual machine the City establishes:
Microsoft SQL Server
ArcGIS Enterprise (formerly ArcGIS Server) version 10.4.x
ArcGIS Desktop Advanced 10.4.x

Please note: The City will need to provide SCG with access to ESRI licensing and ESRI and Microsoft software prior to starting this task. SCG can obtain the licensing and software for the City if the City's customer information is provided. SCG can also be added as an Administrator through the myESRI.com website.

In addition to the software being installed, SCG will also setup an enterprise geodatabase and configure the necessary permissions in SQL Server and ArcGIS Enterprise. Given the City's requirements, SCG recommends that the City implement ESRI's Local Government Information Model (LGIM) geodatabase schema to store enterprise GIS data within. This schema will allow the City to take advantage of a variety of ESRI application templates that are pre-configured to work with this model. SCG will load LGIM template into ArcGIS Enterprise to create the initial enterprise geodatabase.

Deliverables:

- ♦ Install Microsoft SQL Server onto Virtual Server Provided by the City
- ♦ Install ArcGIS License Manager (If Needed)
- ♦ Install ArcGIS Desktop 10.4.X On Virtual Server for Administration
- ♦ Install and Configure ArcGIS Enterprise Server Version 10.4.X
- ♦ Install and Configure LGIM Schema into Enterprise Geodatabase
- ♦ Install ArcGIS Web Adaptor

Task 3: Setup ArcGIS Online/Portal

In this task, SCG will setup the City's ArcGIS Online Organization account and users using ESRI's recommended setup for Local Government. The ArcGIS Online Organization account will be the primary access point for City staff to access GIS information. SCG will configure one ArcGIS Online Web Application for use by the City as a general GIS Viewer.

SCG will create a digital map in ArcMap that will be used to publish a general basemap for ArcGIS Online and a general GIS Viewer application. We will work with City staff to define the cartographic look of the map. A draft map will be reviewed with the City. The map will be revised based on feedback provided by the City.

Once the map is approved by the City, map services will be created and published for access by ArcGIS Online. A Map Service is how ArcGIS Online will access the map. A geocoding service will also be setup. This service will be used to find an address or intersection on the map.

Deliverables:

- ♦ ArcGIS Online Organization City Account Established
- ♦ User Accounts Configured
- ♦ Groups Configured
- ♦ Homepage Configured
- ♦ Map and Geocoding Services
- ♦ General GIS Viewer Web Application

Task 4: Data Migration for EnerGov

SCG will load existing GIS data needed to support EnerGov into the LGIM schema within the ArcGIS Enterprise geodatabase and will create the basemap dataset that will be used by EnerGov. It is anticipated that the required GIS data will be either data provided by the City or data that is freely available from the County of Riverside. SCG will compare the County parcels and centerlines to the imagery to verify that the County data is spatially suitable for use by the City as a basemap.

Any City provided GIS data needing to be accessed within ArcGIS Online or EnerGov (via ArcGIS Online) will need to be converted to feature classes that will reside in the Enterprise Geodatabase. For initial EnerGov support, we propose to migrate the following data into the Enterprise Geodatabase:

- ♦ Parcels*
- ♦ Address Points
- ♦ Street Centerlines*
- ♦ City Boundaries

   * SCG will compare the Riverside County Parcels and Street Centerlines to the City's imagery to verify that the spatial accuracy is suitable for the City's basemap. If issues are found, SCG will coordinate discussions with Riverside County on the best process to get the County parcels updated to meet City's needs.

SCG will also develop new map and feature services for these layers in the City's ArcGIS Online Organization account and collaborate with Matt Woods to reconfigure EnerGov to access the new map and feature services.

Deliverables:

- ♦ County Parcel/Centerline Analysis Findings
- ♦ Load layers into LGIM schema that support Energov
- ♦ Publish layers to ArcGIS Online/Portal for EnerGov
- ♦ Collaboration with Matt Woods to reconfigure EnerGov

Task 5: Additional Layer Migration

In this task, SCG will collaborate with the City to determine additional layers, most beneficial to the City, for loading into the Enterprise Geodatabase. This will be accomplished through consultation with applicable City staff to determine layers needed to support prioritized business needs of various departments. Once the relevant layers are identified, SCG will migrate the layers to the Enterprise Geodatabase LGIM schema.

The migration of existing data layers may require some level of data and attribute translation or reformatting to be properly imported into the LGIM schema. In these instances, SCG will collaborate with the City to ensure the translated data layer meets the City's needs.

In addition, layer consultation may reveal the need for data in the Enterprise Geodatabase that is not currently in a GIS format. Common examples of such data include paper maps, tabular lists, hardcopy descriptions of specific areas such as planning areas, Community Facilities District, special use zones, etc. In these instances, SCG will collaborate with the City to convert the data to a digital GIS layer that is suitable for loading into the LGIM geodatabase schema.

Finally, SCG will publish any newly developed or reformatted layers into new and/or revised map and feature services to incorporate the new layers into the City's ArcGIS Online Organization account.

Deliverables:

- ♦ Layer Consultation Meeting Notes
- ♦ Report Listing Prioritization of Additional Layers
- ♦ Newly Developed GIS Layers (As Needed)
- ♦ Additions of Layers to City Enterprise Geodatabase
- ♦ Published Layers Added to ArcGIS Online Organization Account

Task 6: Ongoing Support

In this task, SCG will provide ongoing technical services related to the implementation of the City's ESRI GIS solutions. This work will be performed on a task order basis, and SCG will provide a written estimate of hours and costs prior to starting any work under this task. Work will not start until the City has authorized the work.

Activities that may be performed under this task are described below.

- ♦ Provide Ongoing GIS Support Services as Needed
- ♦ Setup and Configuration of New Map and Feature Services in ArcGIS Organization Account
- ♦ Installation and Configuration of Mobile and Web Application Templates
- ♦ GIS Data Collection
- ♦ GIS Map Production
- ♦ GIS Data Development or Conversion
- ♦ GIS Data Editing and Updates
- ♦ Data Migration of Additional Data into Enterprise Geodatabase
- ♦ GIS Integration with Other City Systems
- ♦ Other Technical Services as Requested

Proposed Schedule

Task	Weeks						
	1	2	3	4	5	6	7+
Task 1: Project Initiation	■						
Task 2: Setup GIS Server	■	■	■				
Task 3: Setup ArcGIS Online/Portal		■	■	■			
Task 4: Data Migration for EnerGov			■	■	■	■	■

Proposed Fee Schedule

We propose Tasks 1 thru 4 on a Fixed Fee budget of _$34,900_. Due to the uncertain and highly variable level of effort that may be involved in migrating existing GIS data from its current formats and/or converting non-GIS data into GIS data that can to be loaded into a precisely defined Enterprise Geodatabase schema, we are unable to provide fixed

cost estimates for Tasks 5 and 6. We propose to bill these tasks at the rates listed below, on a time and material basis, based on an authorized budget to be determined in consultation with the City.

Description	Fixed Fee
Task 1: Project Initiation	$3,700
Task 2: Setup GIS Server	$2,300
Task 3: Setup ArcGIS Online/Portal	$3,700
Task 4: Data Migration for EnerGov	$25,200
Total	**$34,900**

Description	Fee
Task 5: Additional Layer Migration	Time and Materials
Task 6: Ongoing Support	Time and Materials

Hourly Rates

Title	Rate
Principal	$150
Senior Associate	$133
Associate	$115
Programmer	$ 98
Analyst	$ 86
Technician	$ 60

Mileage

Mileage will be billed at the 2017 IRS Standard Mileage Rate of $0.535 per mile.

For the services performed related to the projects which are not listed herein, compensation shall be at the hourly rates set forth, together with reimbursement, at cost, for incidental expenses incurred in connection with such services, together with reimbursement for outside services at cost plus 15%.

We have enjoyed working with the City in the past and look forward to continuing our long-standing relationship. If you have any questions regarding our proposal, or if additional information is needed, please contact our office at (951) 520-3331.

Sincerely,

Shane Spicer

cc: Matt Woods, City of Lake Elsinore
    Melissa Bellitire, Spicer Consulting Group