

***Archaeological Survey***  
***Pecan Creek Ranch***  
***14.75 Acres off Toutant Beauregard Road***  
***Boerne, Texas***

***April 5, 2012***

***FGS Control # FGS-12136***

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***Prepared exclusively for***

***MTR Engineers, LLC***  
***12770 Cimarron Path, Suite 100***  
***San Antonio, Texas 78249***

***Frost GeoSciences***

***Geologic and Environmental Consulting***

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April 5, 2012

MTR Engineers, LLC  
12770 Cimarron Path, Suite 100  
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Attn: Mr. Duane Moy, P.E.

Re: Archaeological Survey  
Pecan Creek Ranch  
14.75 Acres off Toutant Beauregard Road  
Boerne, Texas

Frost GeoSciences, Inc. Control # FGS-12136

Dear Mr. Moy:

Frost GeoSciences, Inc. in conjunction with Abasolo Archaeological Consultants have completed the Archaeological Survey at the above referenced project site. The results of our investigations have been combined and are provided in the following report.

If you have any questions regarding this report, or if Frost GeoSciences, Inc. may be of additional assistance to you on this project, please feel free to call our office. It has been a pleasure to work with you and we wish to thank you for the opportunity to be of service to you on this project. We look forward to being of continued service.

Sincerely,  
Frost GeoSciences, Inc.



Steve Frost C.P.G., P.G.  
President, Senior Geologist

### Restricted Cultural Information

According to the Texas Administrative Code: TITLE 13: CULTURAL RESOURCES, PART 2, TEXAS HISTORICAL COMMISSION, CHAPTER 24, RESTRICTED CULTURAL RESOURCE INFORMATION, RULE §24.3 Scope: "The intent of these rules is to restrict access to specific cultural resource data to those individuals that have a legitimate scientific or legal interest in obtaining and using that information. The intent is not to limit the public's use of all information that the commission has within its libraries, files, documents, and the THSA database; however, as provided for in §442.007(f) of the Texas Government Code, and §191.004(a-c) of the Texas Natural Resources Code, the commission can determine what cultural resource information is sensitive and what information needs to be restricted due to potential dangers to those resources. The cultural resources that the commission considers to be at risk include Archaeological sites, shipwrecks, certain historic structures and engineering features. Public disclosure of any information relating to the location or character of these resources would increase their risk of harm, theft or destruction. Therefore, this information is defined as restricted and is not subject to public disclosure under state law. Restrictions on who can obtain data and how the data are used is within the legal authority of the commission, and can be defined through the rule-making authority of the commission."

As a result, it must be noted that the information contained within this report cannot be made available to the general public and additional copies of this report and the attached maps are not permissible without the written consent of Frost GeoSciences, Inc. and Abasolo Archaeological Consultants.

### **Abstract**

Abasolo Archaeological Consultants conducted Phase I archaeological investigations of the new 14.75 acre school site on the Pecan Creek Ranch tract in northwest San Antonio, Texas. The survey parcels consisted of three tracts of land of 5.23, 8.29, and 1.23 acres. A 100% pedestrian survey was conducted of each parcel and backhoe testing was conducted in two of the tracts. Only a trace of cultural resources was detected in the 8.29 acre tract which did not extend into the area of construction. No further archaeological work is recommended.

## Introduction and Background

Abasolo Archaeological Consultants (AAC) conducted Phase I archaeological investigations of the new 14.75 acre school site on the Pecan Creek Ranch tract in northwest San Antonio, Texas. Backhoe testing of the property was necessary as it is located in a high probability area for prehistoric archaeological sites.

The survey and assessment work will be carried out in accordance with the "Archeological Survey Standards for Texas" to insure that no archaeological or historical resources eligible for nomination to the National Register of Historic Places are damaged or destroyed due to the planned construction. This Phase I investigation is designed to detect and record any archaeological or historical component that may be present in the project area.

The survey parcels consisted of three tracts of land of 5.23, 8.29, and 1.23 acres along the upper reaches of Pecan Creek (Figs. 1 and 2). Pecan Creek, a tributary of Leon Creek, is mostly ephemeral but wet-weather springs are present after periods of heavy rain. We did not observe any permanent springs within the project area.

## Geology and Soils

The dominant geological formation is the Cretaceous Glen Rose formation (Fig. 3) although the valley itself is filled with Quaternary alluvial. Topography is hilly formed by the erosion of the Glen Rose that created the creek valley (Fig. 2). Valley soils are Krum (Kr) complex along the south and west side of Pecan Creek and the frequently flooded Trinity-Frio (Tf) soil association on the opposite side (Fig. 4). Lewisville silty

clay (LvB; 1 to 3 percent slope) is found on a level area between the creek and Toutant-Beauregard Road (Taylor et al., 1991).

## Archaeological Background

### Regional Culture History

The broad outline of the archaeology of northern Bexar County can be discerned. Major time periods and site types are briefly noted here.

The **Paleoindian** period, 9,200-6,800 B.C., has distinctive chipped stone spear points used in hunting mammoth and other late Ice Age mammals early in the period. Other spear types appear with a shift to bison, deer and other game after the Ice Age ended around 8000 B.C. Known site types in northern Bexar County are *campsites* with flint-chipping debris from stone-tool making and repair. One site of Clovis age (9,200 B.C.) was excavated near FM1604 and Leon Creek (Collins et al.2003). A later site, dating around 7,500 B.C., was investigated on the grounds of St. Mary's Hall on Salado Creek (Hester 1986).

Sites of the following **Archaic** period are common in northern Bexar County. These peoples were hunters and gatherers as in the earlier Paleoindian period, but lived in an environment very similar to those of modern times. Projectile points used to tip spears (often erroneously called "arrowheads") change in shape through time, from 6,800 B.C. to 500 A.D. (Turner et al. 2011). Archaeologists use these forms to recognize more specific time frames within the Archaic (e.g., Early, Middle and Late Archaic). In northern Bexar County, the most distinctive Archaic site is the *burned rock midden*. These large accumulations of fire-cracked limestone result from the use of earth-oven cooking starting around 3,000 B.C. (Black et al. 1997; Nickels et al. 2000) Such features were part of *larger campsites*, with large amounts of flint debris from tool-making; sometimes, animal bone (dietary remains) and charcoal that can be used for radiocarbon dating. Other Archaic site types include *lithic procurement* areas (where flint cobbles

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eroded out of the Edwards limestone and were processed), *lithic scatters* (lightly-used areas probably representing short-term hunting and gathering activities), and rarely, *sinkhole burials* (Archaic peoples often disposed of their dead by placing them in sinkholes and caverns; Bement 1994).

By 700 A.D., there began to be some changes in the long hunter-gatherer lifeway. The **Late Prehistoric** is first seen with the introduction of the bow and arrow. The stone arrow points are very small (mistakenly called “bird points”), but could be used in hunting game of any size. By 1300 A.D., the economy emphasized buffalo-hunting. Most sites of this era include *campsites*, often in areas previously used by Archaic peoples, *lithic scatters* of this age; and the *lithic procurement areas* of earlier times continued to be used.

During the **Historic** period, the best known archaeological remains are *ranch and farm houses of cut stone*, dating from the 1840s through the 1880s. *Stacked- stone fences* also occur (Knott 2004). Such sites, including those without surviving structures, are recognized from 19<sup>th</sup> century pottery fragments, artifacts of glass and metal, etc. Later Historic houses and farmsteads, through the early 1900s, are also found.

### **Nearby Sites**

The upper portion of the Leon Creek Valley is poorly known archaeologically. Indeed the northwest corner of Bexar Country has seen very little archaeological work (see Shafer and Hester 2007). To the north two historic sites, the Obert House (41BX497) and Obert Cemetery (41BX498) are located to the northwest of the project area, within the Maverick-Altgelt Ranch National Register District. To the south are sites 41BX84 and 41BX85, recorded by the Leon Creek survey carried out in the early 1970s by Paul McGuff and William Fawcett (Texas Archeological Site Atlas, Texas Historical Commission). 41BX84 is at the confluence of Pecan Creek and Leon Creek. Perdiz (?) and Fairland points were found at this bluff-top site. Nearby is 41BX85, an open campsite also on a Leon Creek bluff. It probably dates to the Middle Archaic.

## Survey Results

The property to be surveyed included the three previously mentioned tracts (Fig. 1).

**5.23 Acre Tract:** The western most tract consisted of a grassy bottomland meadow and a grove of pecan trees bordered by Pecan Creek on the south and an upland slope terminating at a low limestone bluff on the north. It was seen as having a very low probability of prehistoric cultural deposits. An abandoned creek channel cuts through the pecan grove (Fig. 5). The slight rise between this old channel and the creek was backhoe tested to examine for buried cultural deposits (Fig 6. ); none were found.

**TP-1:** Backhoe trench number one was located at GPS coordinates 14 R 0527438E/3284754N, and reached a depth of 1.1 meters. The profile, shown in Figure 7, can be described as follows:

Surface to 60 cm: very dark grayish brown clay (10YR3/2).

60cm – 1.1m: brown clay (10YR4/3) with some calcium carbonate.

No cultural resources were observed either on the surface or in backhoe testing. No further work is recommended.

**8.29 Acre Tract:** This linear tract extends along both sides of Pecan Creek and consists mostly of floodplain (Figs. 1, 2, and 8). It is regarded as a very low probability area for archaeological sites. The creek consists of braided channels and channel scars show considerable lateral movement of the channel in the past. Two small alluvial fans occur on the south side of the creek and since these are the most elevated landforms within the tract, both were tested with the backhoe. Three trenches were excavated to examine for cultural deposits.

**TP-2:** This trench was located on an alluvial fan near the eastern end and at the southern border of the tract at GPS 14 R 528083E/32845778N. It was 3 meters long and 1.1 meters deep. The profile shown in Figure 9 is described as follows:

Surface to 50 cm. Very dark grayish brown clay (10YR3/2) with pebbles of colluvial gravel. No cultural material.

50-80 cm. Dark yellowish brown soil (10YR4/4) with bits of colluvial gravel.

80-1.0 meter. Heavy concentration of limestone flagstone; soil becomes yellowish brown (10YR5/4). Several of the limestone rocks located at the top of the concentration appeared to have been burned. No lithic debitage or *Rabdotus* (*sp*) snails (both indicative of prehistoric human occupation) were observed in the profile or in the inspected back-dirt.

1.0-1.1 meter. Brownish yellow clay mixed with limestone detritus. No cultural material present.

**TP-3:** This trench was placed about 15 meters north of TP-2 (at GPS 14 R 528086E/3284586N) (Fig. 1) to investigate the possibility that the burned rock observed in TP-2 extended down slope. No trace of burned rock or any other signs of cultural refuse was observed in TP-3. The profile seen in Figure 10 is described as follows:

Surface to 30 cm: Very dark grayish brown clay (10YR3/2).

30-50 cm: Dark Yellowish brown clay (10YR4/4) mixed with moderate amount of limestone pebbles and calcium carbonate.

50-80 cm: Same as above but with a stickier clay containing some limestone pebble detritus.

80cm-1.1m: Yellowish brown clay, sticky.

**TP-4:** This backhoe trench was located on a small alluvial fan in south southern part of the tract near the west end (Fig 1). The findings were negative with regards to traces of cultural material, and the profile shown in Figure 11 was virtually identical to that described for TP-1 and will not be repeated here.

In summary, the only possible trace of prehistoric cultural material was observed in TP-2 at a depth of about 80 cm where several limestone rocks that appeared to have been burned were found on the surface of a concentration of limestone detritus. The limestone deposit was a natural deposition originating from the limestone bluff bordering the valley on the south. No other evidence of possible cultural material was observed.

**1.23 Acre Tract:** This tract consist of a road path from Toutant-Beauregard road to Pecan Creek. There was no access to this property for the backhoe so only a pedestrian survey was performed. No cultural resources were observed and no further archaeological work is recommended.

### **Summary and Conclusions**

Pedestrian archaeological surveys and backhoe testing failed to identify any significant cultural resources on the combined 14.75 acres of property along Pecan Creek. No further archaeological work is recommended.

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**Pecan Creek Figures**

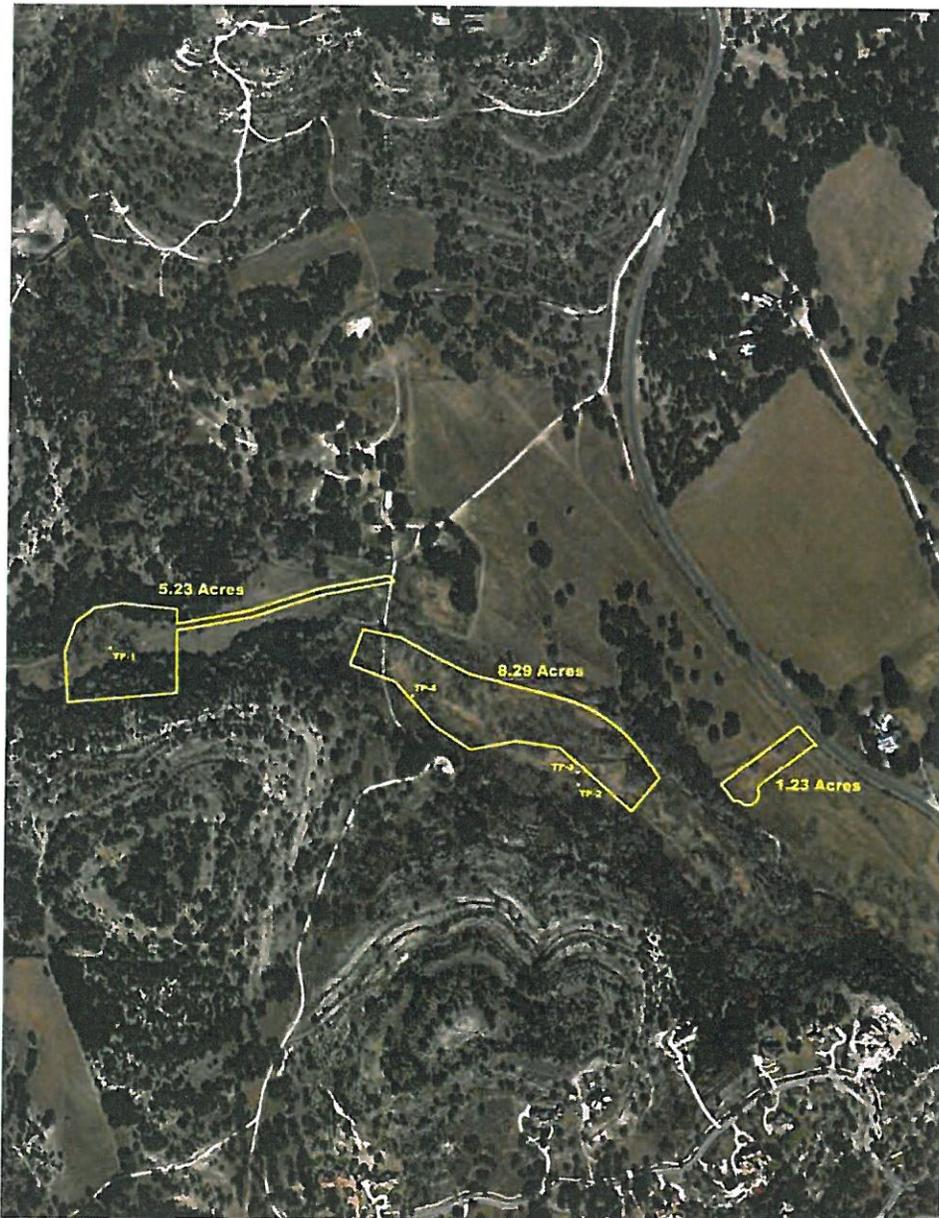
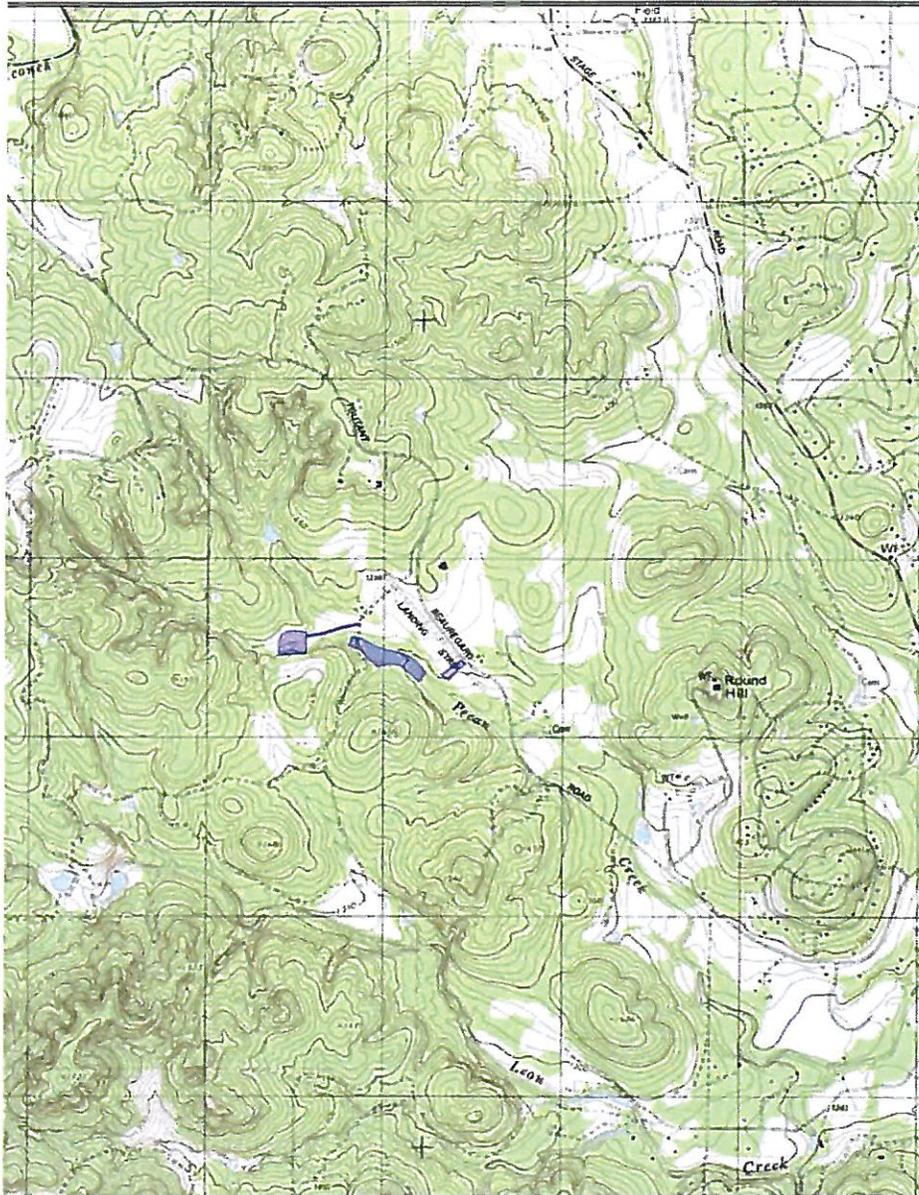


Figure 1. Google Earth view showing the locations of the three parcels and test pits. Map provided by Frost GeoSciences.



**Figure 2. Topographic map of the Pecan Creek valley showing the project location. Map provided by Frost GeoSciences.**

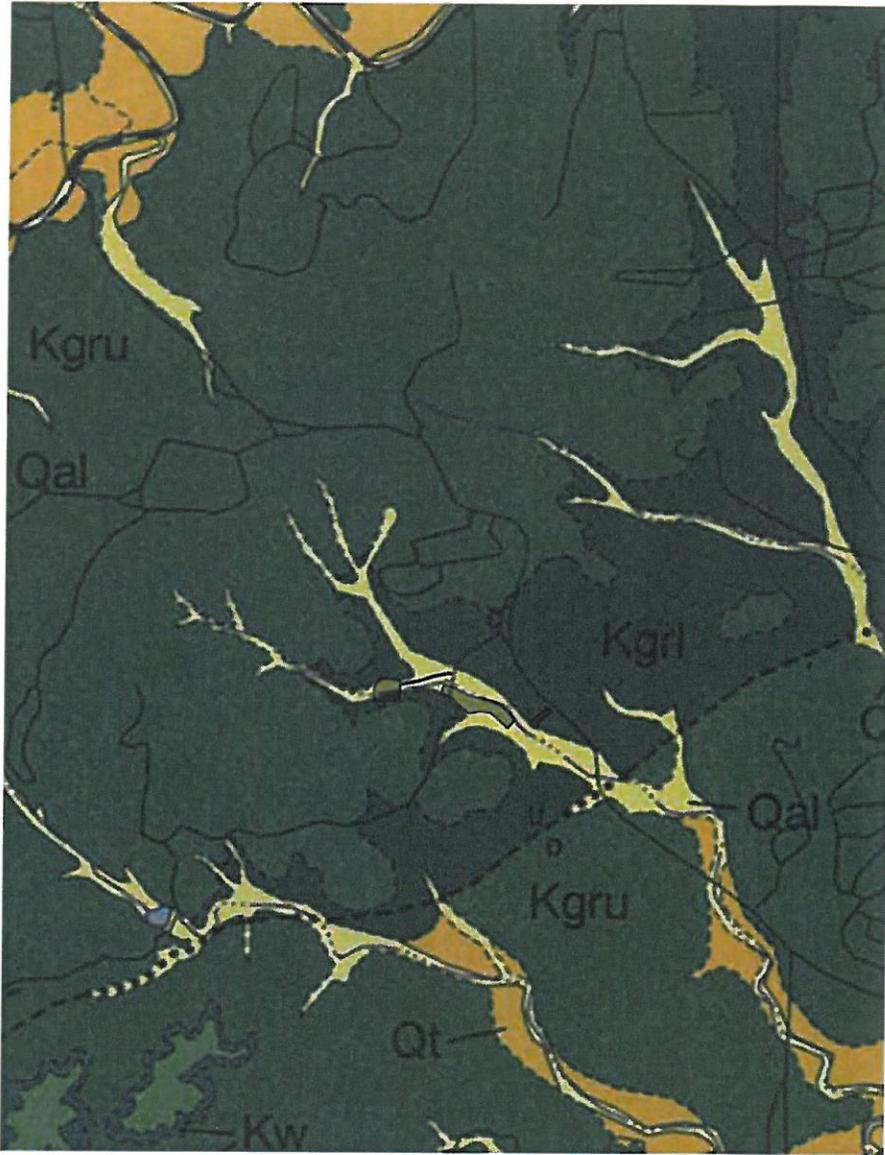


Figure 3. Map showing the project area in the context of the regional geology. Map provided by Frost GeoSciences.

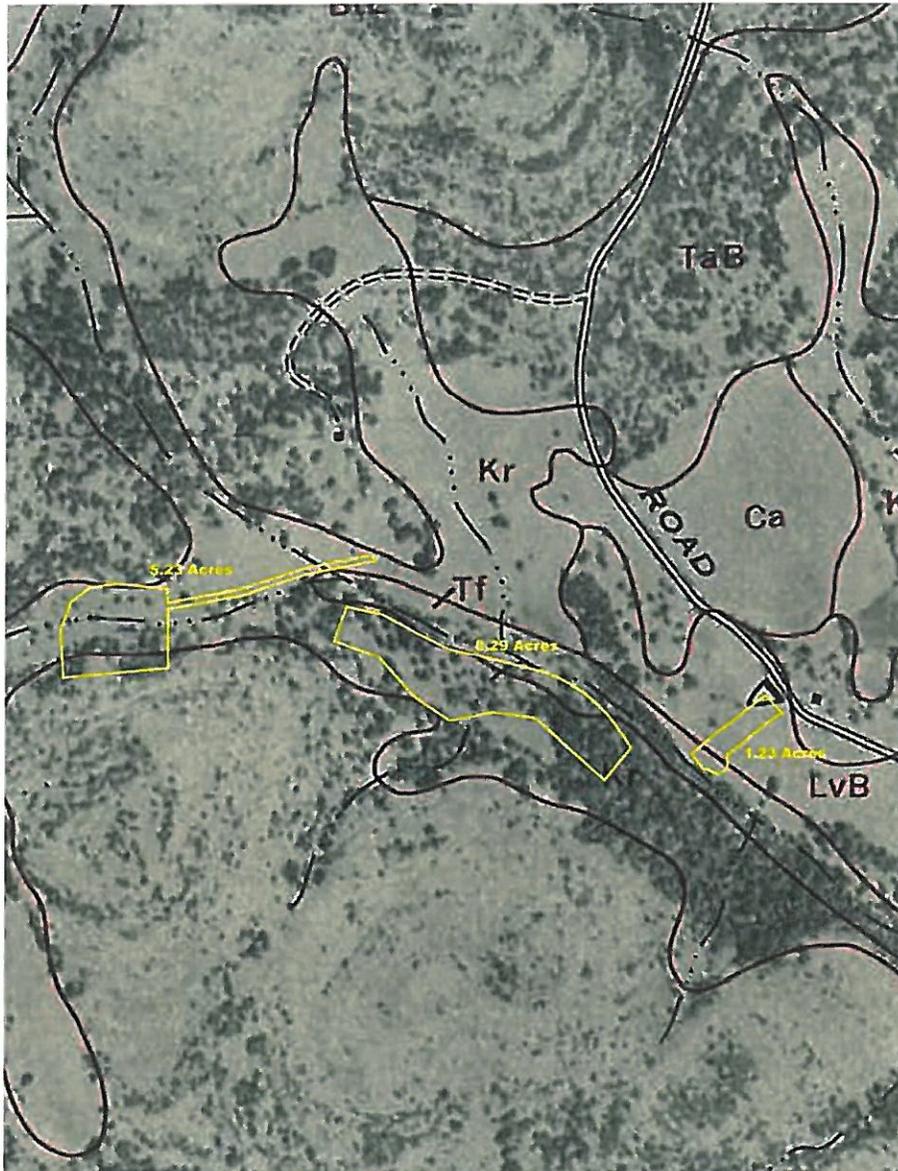


Figure 4. Map showing the survey parcels are mostly within the Lewisville soil series. Map provided by Frost GeoSciences.



**Figure 5. View of the 5.23 acre parcel showing the pecan native pecan grove.**



**Figure 6. Backhoe testing in the 5.23 acre tract.**



**Figure 7. View of the trench profile of TP-1 showing the classic Lewisville soil profile in the Pecan Creek valley.**



**Figure 8. View of the 8.29 acre tract within the Pecan Creek bottom.**



**Figure 9. TP-2 profile showing the colluvial detritus which that contained a trace of possible burned rock.**



**Figure 10. TP-3 profile**



**Figure 11. TP-4 profile**