The Butterfield Trail Through The Concho Valley And West Texas

Tom Ashmore

2019

Updated 2025

Forward

Over a ten-plus year period, it was my pleasure to work with Tom Ashmore on numerous Concho Valley Archeology Society projects. One of the major projects was a CVAS project at Fort Chadbourne, which lasted for five or six years. Other projects included rock shelters on the Nature Conservancy property along Independence Creek over four or five years. Others include Horsehead Crossing and the immigrant Trail at the Green Mounds. Last but not least are the two lost Butterfield stage stations, Johnson station and Grape Creek station.

Johnson Station and Grape Creek Station, as we know them, were no longer visible to a person casually passing close by. Even the ranch owners were unaware of the location of either Butterfield site. Now that these sites are uncovered after years of being lost to posterity, we can confidently pass along our knowledge of where these long-lost sites are located to those that follow us. It was my pleasure to work with Tom on this project for over 10 years. After gaining permission from the property owners, we were allowed to access the general area and begin our search for the exact site. If it had not been for Tom's skill in reading satellite maps and his skill in following the scar left on the land by the mules and the stagecoaches, we would have never found the sites. I can honestly say that I was a skeptic at first in reading the satellite facts, but after Tom educated me on how to use the tools, I came to be a believer in the latest modern-day technology, which helped us solve a mystery. I became a believer in the use of the new technology when Tom and I went to the ranches to match up the satellite picture with the ranch land. With a satellite map in hand, we found where the stage line crossed the main ranch road near the Grape Creek Station. We walked the stage trail in multiple places near the Grape Creek Stage Station, and our satellite guidance maps opened these doors for us. Again I'll say that without Tom's skill in reading satellite maps and his application of this modern technology, we would have never found the Johnson Station or the Grape Creek Station. I am a firm believer in the use of this technology and I attach my name to Tom's report concurring with his findings.

Tom and I worked on the Grape Creek site on the weekends and used our metal detectors to pinpoint the remaining metal objects. During the week, it was my job to search the archives at Fort Concho, reading the Scouting reports and looking for any mention of the Grape Creek Station by the cavalry. We also looked into historical articles for mention of the Grape Creek Station. We came upon an article in Marvin Hunter's magazine from 1911 by Emma Elkins, which shed light on what happened when the Indians attacked. Of course, we referred to the Conkling books repeatedly to be certain that we stayed accurate with our work in the field.

Surely those who follow us will find our efforts to be beneficial and will expand their knowledge of an important time in the Concho Valley. I am proud to have been a part of this team effort and greatly appreciate Tom sharing with me the skills he acquired in satellite map reading during his 20 years in military intelligence.

C.A. Maedgen, III
Region 10 Director for TAS
1/9/2019
SMU BS Geology 1966,
SMU MFA Communications 1968

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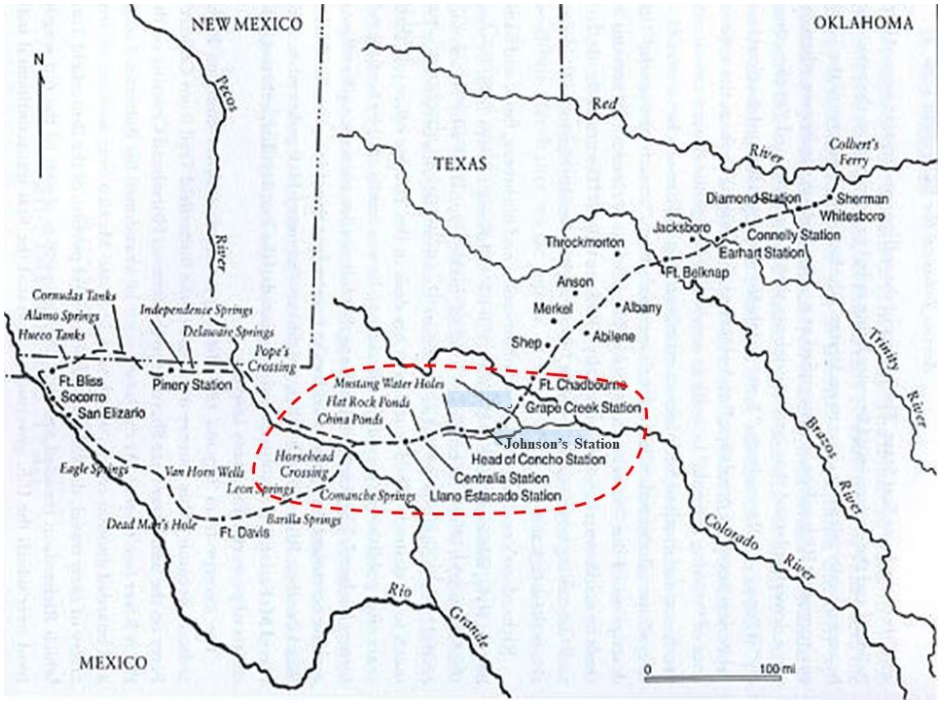
1. Butterfield Overland Mail Overview

One of the most significant periods in West Texas was the period of pre and post-Civil War. This period saw exploding expansion in our country as emigrants made their way through this area to points further west, mostly New Mexico and California. This brought about the Butterfield Stage line from 1857 to 1861, as well as settlers, cattle drives, and trade caravans on this same trail. It also brought with it the Indian wars as the Apache and Comanche viewed this expansion as an encroachment on their land so necessary to the survival of their tribes. As the attacks on settlers and emigrants increased, it brought more military camps and forts to the region. As such, studying the various locations related to these times is significant in clarifying the people and events of those times.

The West Texas section of the Butterfield Trail was one of the most difficult for stagecoach travelers. They knew they were in for a rough ride when they left Fort Chadbourne heading west. Because the trail ran through a dry and unpopulated country - and the fact that it continued to be used long after the Butterfield Overland Mail was discontinued in 1861 - the impression can still be seen by a trained eye through satellite imagery in places that no trail can be found on the ground.



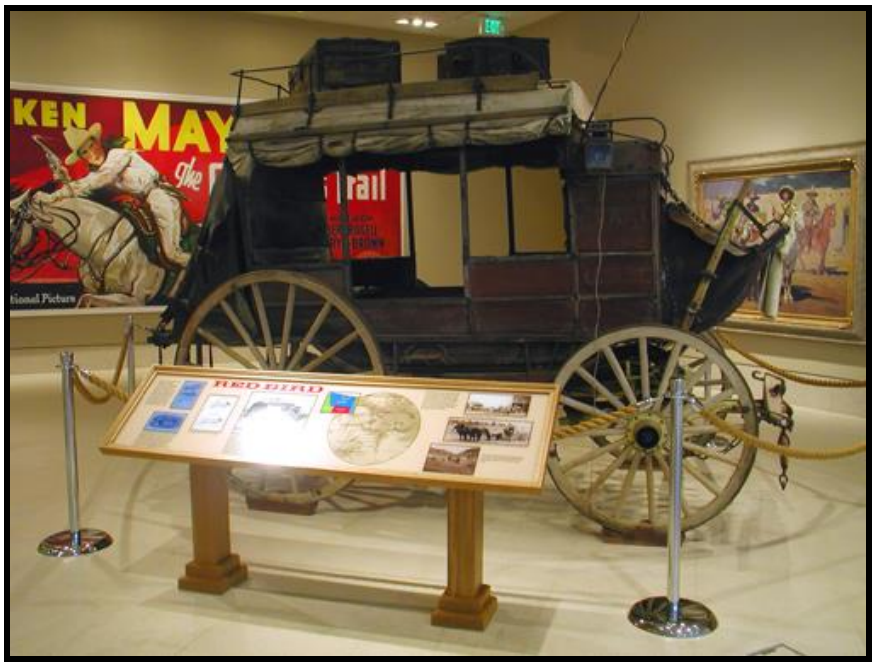
Section of Butterfield Trail studied

Many efforts were made over the years to detail the Butterfield Overland Mail route through West Texas. The team of Roscoe and Margaret Conkling conducted the most famous, documented in their 1947 two-volume book, 'Butterfield Overland Mail' (Conkling). This route study is still considered today to be the most accurate and a sort of bible of the trail's route. However, during their research of West Texas, they were unable to travel many sections of the trail and had to rely on local residents' memory of just where the trail ran. Often the memory of residents turned out to be close, but not accurate. This series of reports, researched for over 15 years, attempts to clear up some of these gaps while taking a journey from Fort Chadbourne to the Pecos River and further to Fort Stockton on the Butterfield Trail.

The official government contract for the Butterfield Overland Mail began in September 1858, running semiweekly from Tipton, Missouri, and Memphis, Tennessee, to San Francisco, California, and the same in the opposite direction. However, the contract was acquired one year prior with a stipulation the mail would begin to run for the government within one year. That year was spent building roads, stations, bridges and everything else needed to complete the project (Butterfield Overland Mail –TSHA). Stages probably began running during that year, but it is unlikely they were carrying paying passengers. They may well have been running as part of the preparation and supplies for the formal opening in September 1858.

The Butterfield Overland Mail schedule called for stagecoaches to pass in each direction twice weekly. The coach had three seats and could carry nine passengers. As the occupants of the front and middle seats faced each other, these six people needed to interlock their knees. The rest of the coach was full of mailbags (Butterfield Overland Mail—Smithsonian).

For the West Texas portion of the trip, the wagons were more rugged than the eastern Concord coaches. Due to their rugged construction, they were built primarily for Butterfield and were called Celerity Wagons or Mud Wagons.



Celerity Wagon or 'Mud Wagon' used by Butterfield Overland Mail Company

(Photo Courtesy of the Booth Western Art Museum)

Another unique aspect of the route in West Texas was the mules used to pull the wagons. They used semi-wild Spanish Mules, originally brought from Spain to Mexico. Spanish mules were smaller than their larger cousins and the mules we are familiar with today, but they were hardier in this rough and dry country.

Spanish Mules (Courtesy horsejournals.com/)

The coaches arrived at Fort Chadbourne on Tuesdays and Fridays, heading west, and on Wednesdays and Saturdays, heading east. The entire trip took 25 days in one direction.

No. 1] [Sep. 16th, 1858.

OVERLAND MAIL COMPANY.

THROUGH TIME SCHEDULE BETWEEN

ST. LOUIS, MO., MEMPHIS, TENN. } & SAN FRANCISCO, CAL.

GOING WEST.

LEAVE.	DAYS.	Hour.	Distance. Miles to Place.	Time allowed. No. Hours	Ave'ge Miles per Hour.
St. Louis, Mo., & Memphis, Tenn.	Every Monday & Thursday,	8.00 A.M	Miles.	No. Hours	
P. R. R. Terminus, "	" Monday & Thursday,	6.00 P.M	160	10	16
Springfield, "	" Wednesday & Saturday	7.45 A.M	143	37¾	3⅞
Fayetteville, "	" Thursday & Sunday,	10.15 A.M	100	26½	3⅘
Fort Smith, Ark.	" Friday & Monday,	3.30 A.M	65	17½	3⅘
Sherman, Texas	" Sunday & Wednesday,	12.30 A.M	205	45	4½
Fort Belknap, "	" Monday & Thursday,	9.00 A.M	146½	32½	4½
Fort Chadbourn, "	" Tuesday & Friday,	3.15 P.M	136	30½	4½
Pecos River, (Ren. Crossing.)	" Thursday & Sunday,	3.45 A.M	165	36½	4½
El Paso,	" Saturday & Tuesday,	11.00 A.M	248½	55¼	4½
Soldier's Farewell	" Sunday & Wednesday,	3.30 P.M	150	33½	4½
Tucson, Arizona	" Tuesday & Friday,	1.30 P.M	184½	41	4½
Gila River,* "	" Wednesday & Saturday	9.00 P.M	141	31½	4½
Fort Yuma, Cal.	" Friday & Monday,	3.00 A.M	135	30	4½
San Bernardino "	" Saturday & Tuesday,	11.00 P.M	200	44	4½
Ft. Tejon, (Via Los Angeles)	" Monday & Thursday,	7.30 A.M	150	32½	4⅔
Visalia, "	" Tuesday & Friday,	11.30 A.M	127	28	4½
Firebaugh's Ferry, "	" Wednesday & Saturday	5.30 A.M	82	18	4⅔
(Arrive) San Francisco,	" Thursday & Sunday,	8.30 A.M	163	27	6

LEAVE.	DAYS.	Hour.	Distance. Miles to Place.	Time allowed. No. Hours	Ave'ge Miles per Hour.
San Francisco, Cal.	Every Monday & Thursday,	8.00 A.M	Miles.	No. Hours	
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(Arrive) St. Louis, Mo., & Memphis, Tenn.	" Thursday & Sunday,		160	10	16

This Schedule may not be exact—Superintendents, Agents, Station-men, Conductors, Drivers and all employees are particularly directed to use every possible exertion to get the Stages through in quick time, even though they may be ahead of this time.

If they are behind this time, it will be necessary to urge the animals on to the highest speed that they can be driven without injury.

Remember that no allowance is made in the time for ferries, changing teams, &c. It is therefore necessary that each driver increase his speed over the average per hour enough to gain the necessary time for meals, changing teams, crossing ferries, &c.

Every person in the Company's employ will always bear in mind that each minute of time is of importance. If each driver on the route loses fifteen (15) minutes, it would make a total loss of time, on the entire route, of twenty-five (25) hours, or, more than one day. If each one loses ten (10) minutes it would make a total loss of sixteen and one half (16½) hours, or, the best part of a day.

On the contrary, if each driver gains that amount of time, it leaves a margin of time against accidents and extra delays.

All hands will see the great necessity of promptness and dispatch: every minute of time is valuable as the Company are under heavy forfeit if the mail is behind time.

Conductors must note the hour and date of departure from Stations, the causes of delay, if any, and all particulars. They must also report the same fully to their respective Superintendents.

* The Station referred to on Gila River, is 40 miles west of Maricopa Wells.

JOHN BUTTERFIELD.
Pres't.

1858 Butterfield Overland Mail Weekly Schedule (Smithsonian National Postal Museum)

2. Satellite Imagery Interpretation of Historic Trails

Satellite imagery is the new tool in the archeology tool set. This is now well-known in the professional archeological community but is also available to amateur historians and archeologists. We need to keep pace with technology as it continues to emerge and use it to its fullest to help us reveal the past. I think that we will continue to find that with this new tool, we will find some of the accepted theories will either be modified or more fully fleshed out, filling in what the military refers to as intelligence gaps. In this case, we can call them historical gaps.

The advent of publicly accessible satellite imagery via Google Earth played a crucial role in finding and interpreting this particular site. First, it helped find it by being able to follow the

Butterfield Trail, something previously unavailable through other means. Even after 161 years, the trail trace is visible to the trained eye.

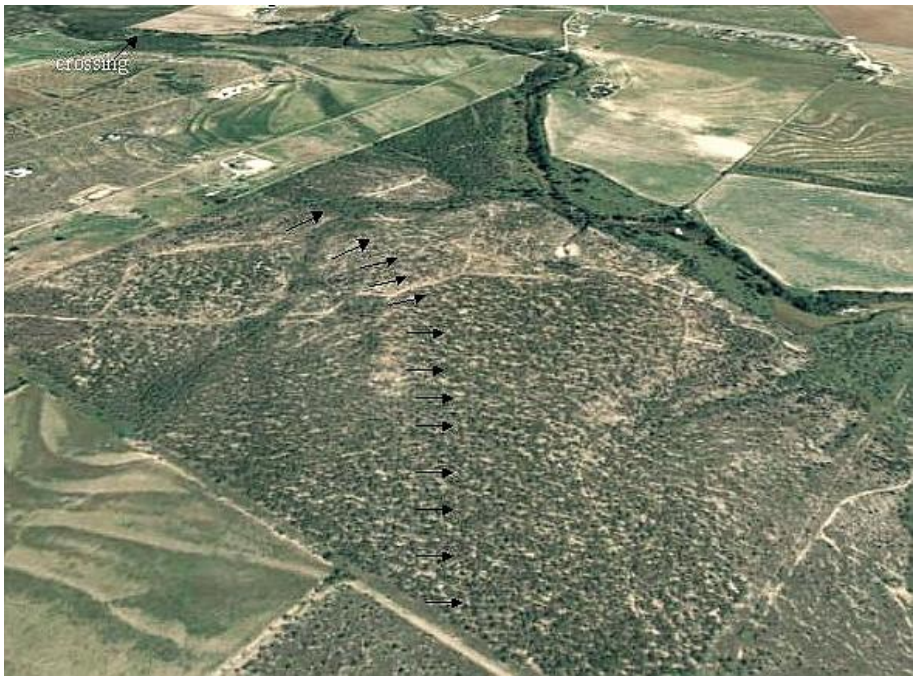
An historic trail can be traced through satellite imagery because satellite images can show slight differences in the vegetation caused by the years of constant use of the trail and then allowing the vegetation to grow back after abandoning the trail. The vegetation will generally grow back slightly different than the surrounding area due to the trail having become a depression, which later attracts more soil and water runoff from rains. Bushes and grass tend to grow slightly healthier in the depressions. It can be so slight in most areas that casual observation on the ground or even from an aircraft cannot detect it. However, using satellite imagery, especially with multiple images of the same location using Google Earth's 'Historical Imagery' tool, a trained eye can find the trace of these vegetation changes in long wagon trail lines across the terrain. A good example of this is a spot just off Arden Road, outside of San Angelo. Standing on the spot where the trail is and looking directly down the trail, if you did not know it was an old trail, you would take the difference in the terrain and vegetation as natural. However, you can see a slightly better growth in the grass from the long-ago depression.

Butterfield Road Wagon Swales

Using satellite imagery from a highly oblique angle, which is what Google Earth allows, can reveal the slight difference in much more striking contrast, and you can see the trail as it snakes across the countryside. However, the capability of historical imagery is another essential feature of Google Earth that is needed to follow the more difficult stretches of the trail. When looking at a location with the historical imagery capability set to on, you can move through the many years of images, looking at the same piece of earth from the same angle and finding the one that will

show the trace best for that piece of earth. I try to angle it out and go pretty far out to get a long-distance look. That is usually where I can see the faint trails best. The old trails tend not to follow existing boundaries or roads. When you see a faint trail crossing multiple properties but in no logical relationship to modern boundaries, it is a good bet if it is an old trail. They always followed the easiest terrain possible - no steep cuts or hills. If they had to go down a cut, they would always find the easiest way possible. You have to look at the trails from all different angles to pick them out piece by piece. Sometimes, I go backward as if looking out the back of an airplane, and sometimes, I go forward as if I'm looking out the front. I've even followed the trail sideways. It all depends, and it's a lot of trial and error. I connect the pieces together using the Google Earth line drawing tool to put a line down on top of it, and then I begin with the next piece from the end of the line. Most of the time, the trail is darker rather than lighter. Sometimes, it looks like a bunch of bushes in a row, and sometimes, it is just some dark splotching that resembles a faint line. The final trick is to be able to move the image forward and backward or side-to-side. This allows your eyes to pick up the hard-to-find trace line where they could not in a still picture. I've found that the best elevation to be at is around 3,000 feet.

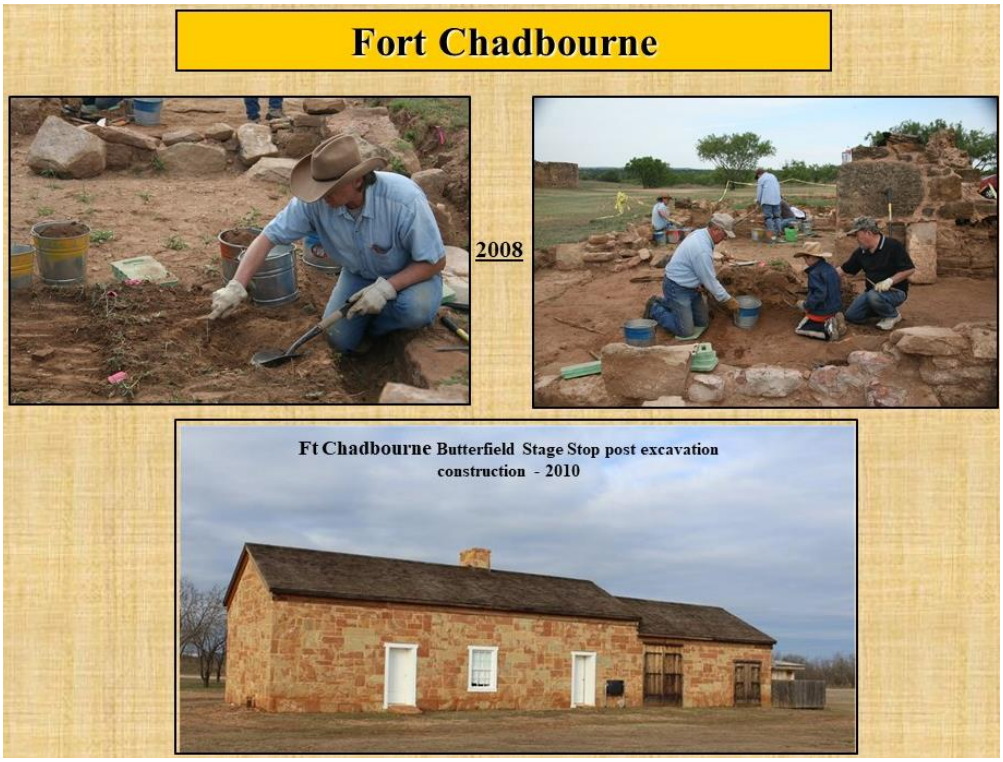
The following picture shows the trail as it heads to the North Concho River crossing point. Notice the slightly darker vegetation in a line highlighted by arrows.



Satellite image of Butterfield Trail as it heads north to Middle Concho River crossing

(Google Earth)

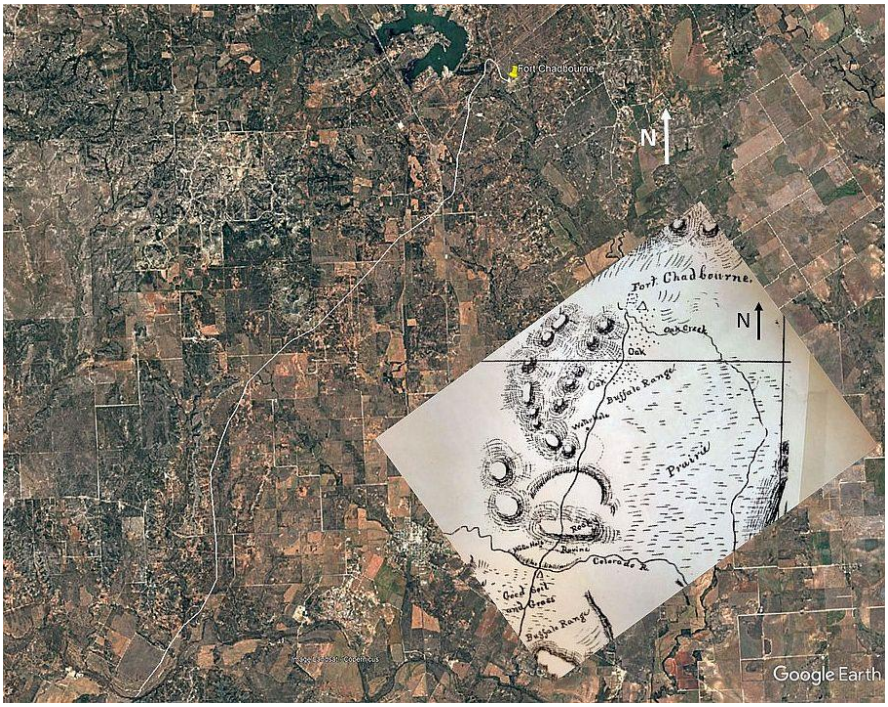
3. The Butterfield Trail From Fort Chadbourne



Butterfield Stage Coach Station Excavation and Reconstructed

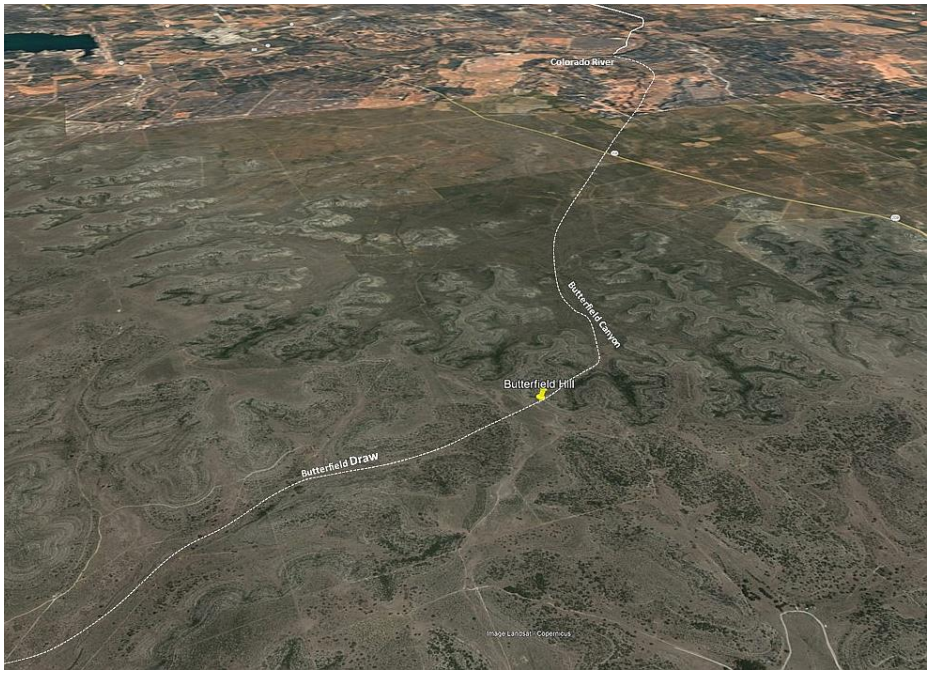
To be sure you are on the Butterfield Trail, you must begin from a known point. In this case, we know that Fort Chadbourne was a main stage stop for the Butterfield Overland Mail and exactly where the stage building is. With this, we can start our journey, heading west.

The best source of the trail heading west out of Fort Chadbourne is the military map created by Brevet Lieutenant Colonel Strang during his 1867 expedition from Fort Stockton to Fort Chadbourne. That expedition included a cartographer who drew a highly detailed map of the entire route. They essentially followed the known road, which was the old Butterfield Road. The old road can be found on Google Earth using the map as a guide.



Comparison of Strang map and Google Earth Trace from Colorado River to Fort Chadbourne

From the Colorado River, heading south, the road ran up what is now called Butterfield Canyon to cross over a set of hills. The road going up is well known, and the hill is known as Butterfield Hill. Heading down the other side, the road runs down what is known as Butterfield Draw. It heads almost straight to the East Fork of Grape Creek.



Butterfield Road from Colorado River to Grape Creek (Google Earth)

4. Archeological Investigations of Grape Creek Station (41CK305) Coke County

The Butterfield Overland Mail's Grape Creek Station was a smaller, mule-changing station in the Concho Valley before any habitation in the area. It was abandoned in 1861 due to the onset of the Civil War, but the former location was still known until the early 1900s. After that, the memory of its location was lost as those with the knowledge passed on. The general location was known, but first-hand knowledge was lost. Roscoe and Margaret Conkling attempted this in the late 1940s when they wrote their now-famous 3-book set on the Butterfield Trail. Still, they could never locate the station site and had to rely on the landowner's location description. Over the years, several avocational archeologists and historians attempted to verify the described location as they hunted the local area, but to no avail. This study used new satellite technology to find the actual location and straighten out the history of this small but important site in the area.

With the landowners' permission, the on-ground efforts began with metal-detecting surveys of a narrowed-down location. Very quickly, the site was identified through the metal-detecting and verification of the trail running to it, and a more thorough survey project began to tie the archeological artifacts pulled from the ground to compare against the research and confirm the identification as the Grape Creek Station.

Grape Creek Station was the first relay station for the Butterfield Stage line heading west after leaving Fort Chadbourne, Texas. It was one in a series of stations for the stages crossing West Texas on the way to or from the Pecos River and New Mexico. It was located on the east side of the east branch of Grape Creek, a spring-fed creek running north to south. Travelers came to the station after a southerly crossing of 30 miles through the dry West Texas land and over a small set of hills given the name Stone Mountain at the time. Coming from the west, it was the next station after the Johnson's Station on the Middle Concho River, a distance of 32 miles. Although neither Fort Concho nor San Angelo existed at the time, the location sits just over 18 miles north of these current locations and 10 miles northeast of the current town of Grape Creek.

This stage station site was bordered to its west by the east branch of Grape Creek, sitting in a valley running north and south one mile wide by four miles in length. It is in an active floodplain along the creek area with low hills to the east and west. Over the decades the site has seen many savage floods and fires, which is why the site had little to see on the surface of the station's occupation. The main area of interest is in an open field cleared of cedar and mesquite by the landowners, who also never knew of the site at this location.

This area would have been open prairie in the 1800s. The elevation is 2,190 feet. Grape Creek lies approximately 200 feet west of the estimated location of the original main building. The site takes up just under a quarter acre.

We know a few things about the Grape Creek Station construction from first and second-hand accounts of the period. The first account came from Mr. Waterman Ormsby, the first and only passenger of the inaugural run of the Butterfield Overland Mail (Wright). Ormsby was a special correspondent for the Tucson Arizona Herald and rode the entire route in September 1858. His account of the station follows:

Waterman Ormsby (Wikipedia)

"We soon reached it and found it to be a corral or yard, for the mules, and tents erected inside for the men, under the charge of Mr. Henry Roylan. They had seen us coming and were herding the mules as we drove up. Their corral was built of upright rough timber, planted in the ground. They had pitched their tents inside, for fear of the Indians, and took turns standing guard, two hours on and two hours off. The station was near Grape Creek, a fine stream, and

also near some fine timber -- two desirable things not to be found everywhere in Texas."

Later, a cabin was built outside the corral, and a wooden picket stockade wall enclosed the two. We know this from an account by Mrs. Emma Elkins in a 1911 article in Hunters Magazine (Elkins). Mrs. Elkins lived on Fort Chadbourne at the time of an Indian attack, and her account came from the Grape Creek station occupants themselves while Mr. Pennington, the station manager, was recovering in the Fort Chadbourne hospital.

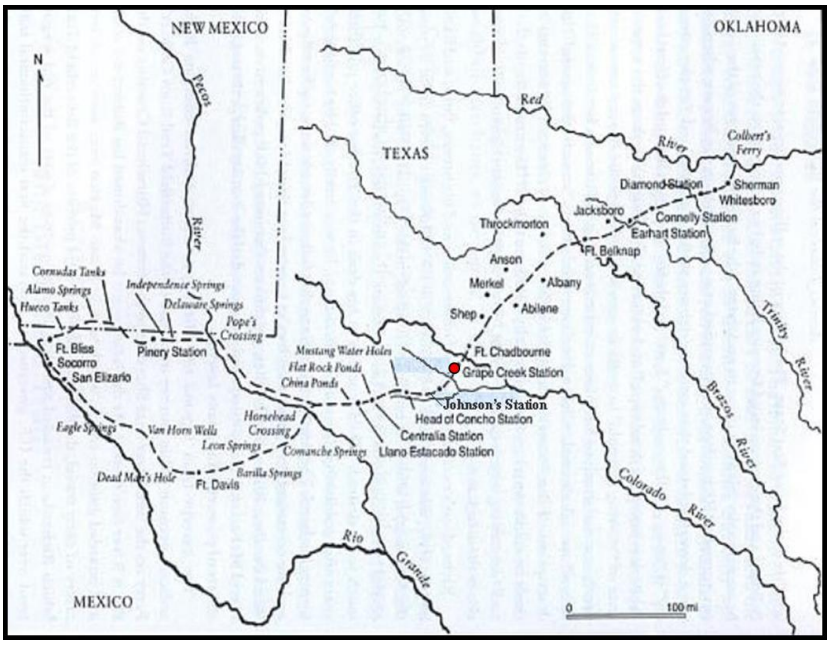
"One fusillade after another was fired at the house without serious results, the house being built of split logs and therefore bullet-proof, and the premises enclosed by a picket fence five feet high."

The next day, the station was to be closed and abandoned, unrelated to the Indian attack. The company had given orders to close everything down due to the onset of the Civil War, and at the time of the attack, they were already packed to leave. The military escorted them back to Fort Chadbourne after the attack for Mr. Pennington's recovery, and afterward, they moved back to their home in Mason, Texas.

Grape Creek Station Post Butterfield Stage Period

After the stage station was abandoned in 1861 this was still the main road for all travelers from east to west through north Texas to New Mexico. Up to the late 1800s, this road was used by emigrants heading west, cattle drives, military ranchers, and freighters, crossing into Texas from what is now Oklahoma at Collier's Ferry in the area of Whitesboro. Similar to Johnson's Station - the abandoned stage station on the Middle Concho River - the "old" Grape Creek Station became a popular camping spot for travelers headed in either direction. The reason for this was fairly obvious once you see the location. If you were heading west, you would have just come over a rough set of hills and about an 8-hour day's travel from Fort Chadbourne. If you were heading north from either the old Johnson's Station or, in later times, Fort Concho, you would again have just completed an 8-hour day and would be facing the hills as your next obstacle.

The archeological artifacts recovered from the site support this postulation of this continuing to be a preferred campsite.



Butterfield Trail through West Texas

Grape Creek Station Ranch Period

The ranching period for this area began in 1899 when John Abe March and his brother, Napoleon Murph March, purchased 30,000 acres from B.M. Collyns. According to Coke County records, Collins purchased the land from the state of Texas in 1880.

There is no indication from the evidence or family history that this site was ever occupied by the March brothers or B.M. Collyns. The March brothers knew of the site and tried to describe it to Roscoe Conkling during his visit in the late 1940s, but they never actually took Conkling to the site. There was some confusion by either the conveyance of the site location or Conkling notes because the site location, as described, was misidentified in Conkling's subsequent book. It was a minor error of compass direction from the March home but critical in the station's actual location. This was confirmed by the fact that an archeology group from Odessa, TX, searched for the site as described in the Conkling book around the year 2,000, but after extensive searching, their efforts turned up nothing.

Determining the exact trace of the trail was incorporated into the research to properly correlate the satellite imagery data with accounts by stage passengers or any persons with first-hand knowledge. The final piece is to obtain access to the property to confirm both the trail and the site and work it as an archeological project to lay the final piece of the puzzle in place.

Comparing First-Hand Accounts with Satellite Imagery To Find The Location

The first account that needed to be correlated to imagery interpretation of the trail leading to the station was that of Ormsby and his portion of the trip from Fort Chadbourne to Grape Creek. In his account, he asked the driver how far it was to the next stage stop.

"How far is the next station?"

"I believe it's 30 miles."

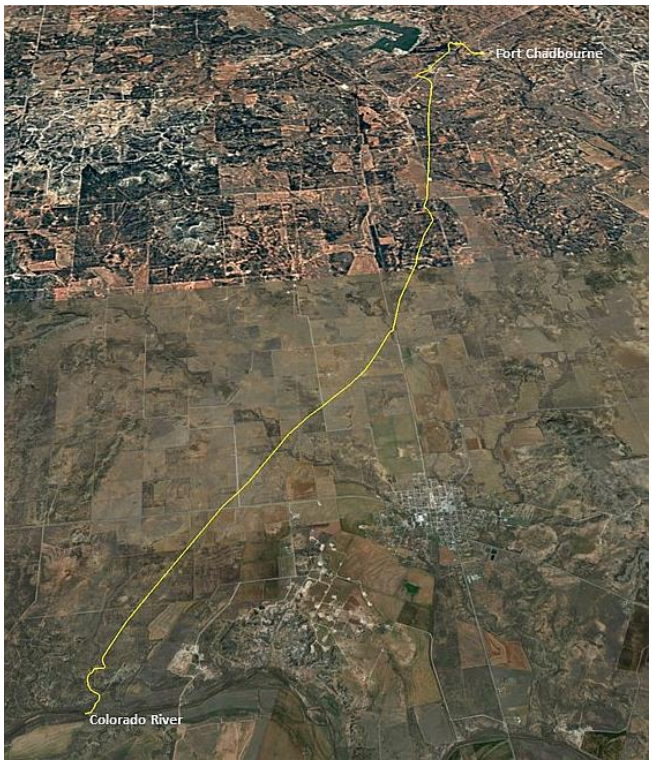
"Do you know the road?"

"No."

"How do you expect to get there?"

"There's only one road. We can't miss it."

Two wagon trails are leading out of Fort Chadbourne. The earlier road was a military road used to transfer the military from the previous encampment, named Camp Johnston, to Fort Chadbourne in 1853. A portion of this road has long been believed to be the same road as the Butterfield Trail. However, in 2010 I discovered the Butterfield Trail took a more direct route from Fort Chadbourne south to the Colorado River. (Ashmore 2016) This route to Grape Creek Station measures 30.2 miles, while the older military route to the Colorado River and then to Grape Creek Station is 31.5 miles.



Trail trace to Colorado River (Google Earth)

Additionally, the older military route winds through some fairly rugged country on its way to the Colorado River. In contrast, the other route almost parallels the current Highway 277 over a flat prairie. Again, going back to Ormsby's account:

> ***"Fortunately, our course was a clear straight one, leading across a boundless prairie."***

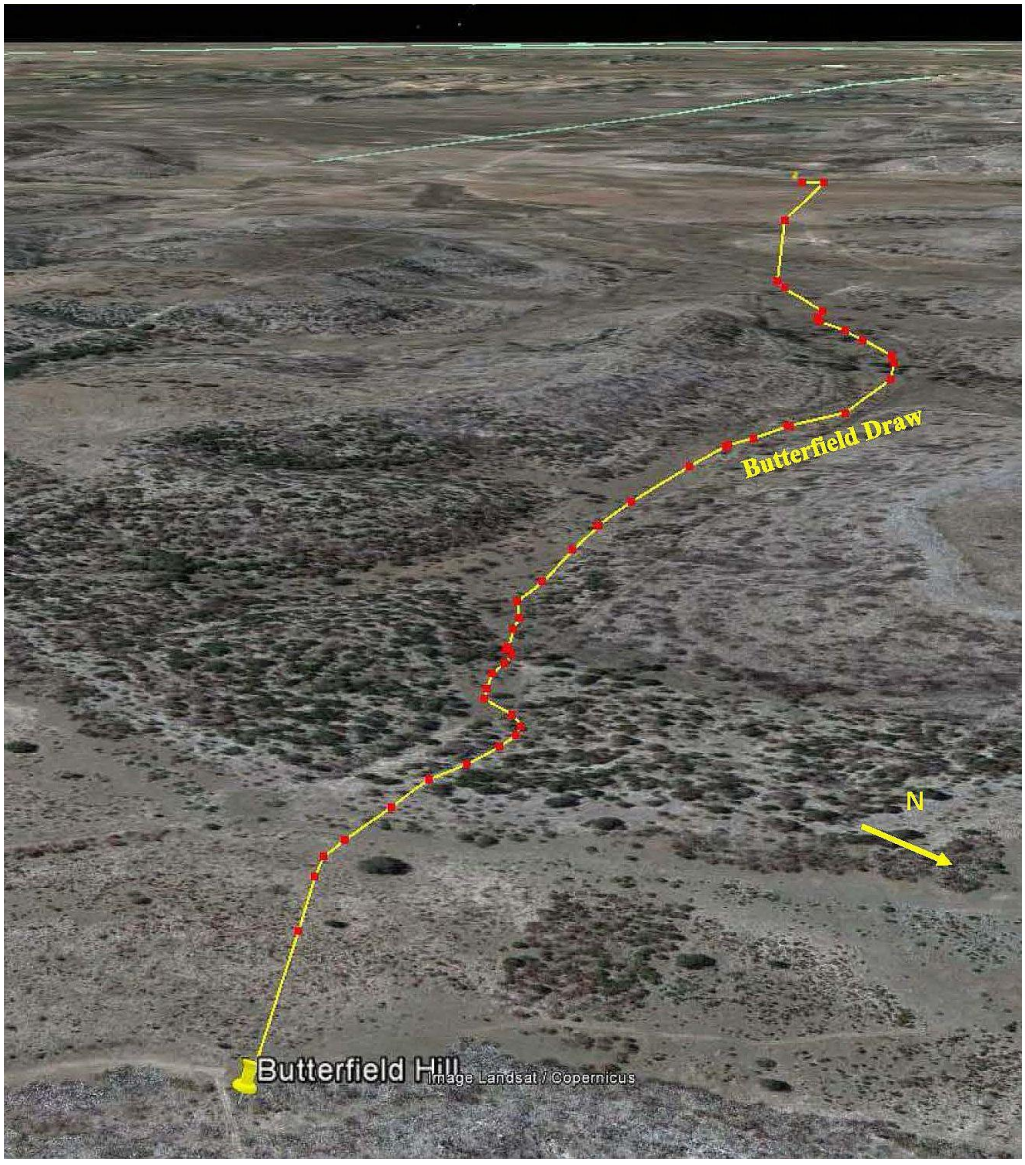
The trail must cross a rugged set of hills that run northwest to southeast to get over to the valley Grape Creek runs through. The route leading up to this set of hills and the road climbing up the east side is well known. The east side is named Butterfield Canyon, and the road is cut through the rugged limestone. It is fairly steep getting up. According to Ormsby, because they had to do with just two mules instead of four, they stopped halfway up and refused to go any further. So, they spent the night to let the mules rest and made it to the top in the very early morning hours while it was still dark. When they reached the top, he continues:

> ***"We ascended the hill and discovered the station fire, miles distant – a mere speck among the trees."***

Again, going back to Google Earth and taking the view he described, you find the only possible location he might have been able to see the station fire from would have been down a draw looking west with a very narrow view between the lower hills. That draw is named Butterfield Draw on all topographic maps. Ormsby continues,

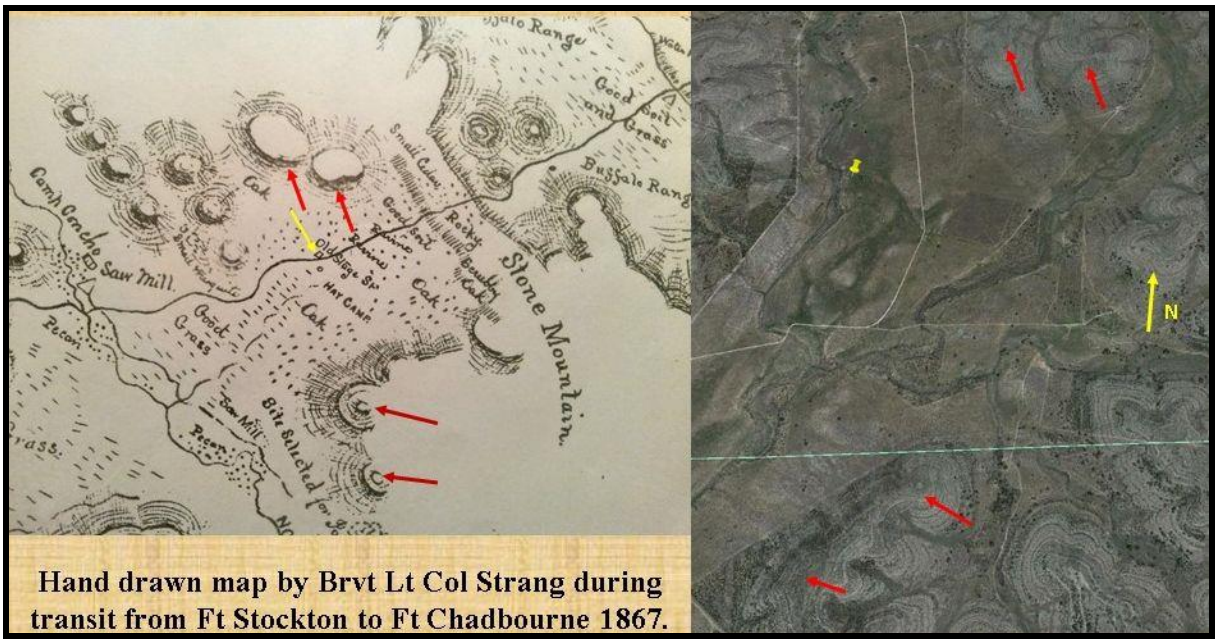
> ***"The station was near Grape Creek, a fine stream, and also near some fine timber -- two desirable things not to be found everywhere in Texas."***

The fine timber is gone, but when running, it is still a fine stream.

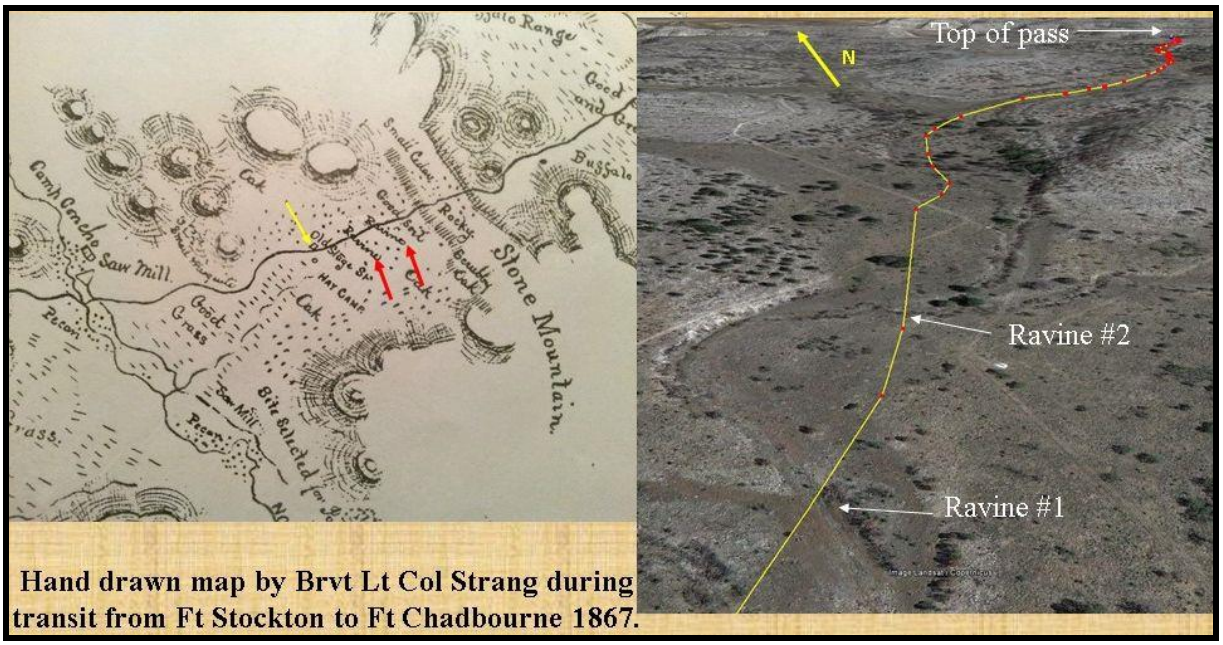


Looking down on Grape Creek Station from top of hills (Google Earth)

The following account comes in the form of a map. In 1867, Brevet Lieutenant Colonel Strang made a journey from Fort Stockton to Fort Chadbourne to assist in preparations for the transfer of the military from Fort Chadbourne to the new Fort Concho. By comparing the map against Google Earth imagery, several items match the current location. The first is the station, which is in relation to a set of hills to both the north and south. Setting the two side by side makes a perfect match. The second is his description of two ravines they crossed after leaving the station location and heading up the hills as they continued east and north to Fort Chadbourne. Again, it is a perfect match.

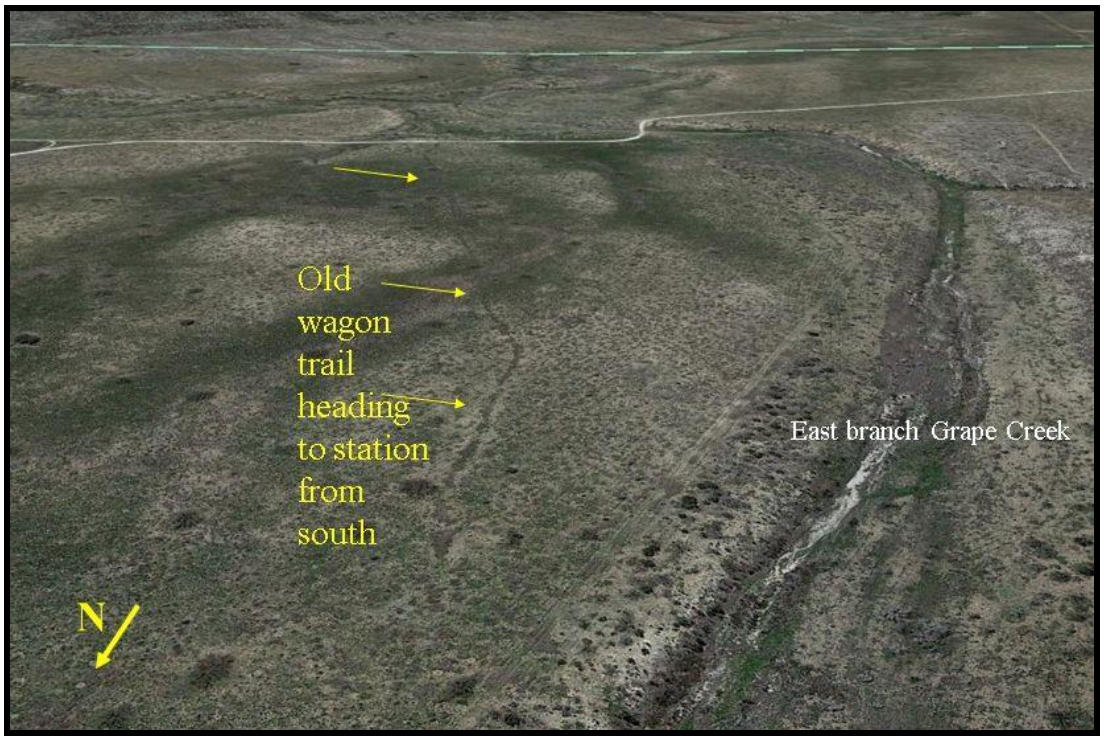


(Google Earth trace on right)



(Google Earth trace on right)

That brings us to the trail, which can still be seen in satellite imagery. After crossing the creek, which comes up from the south, the trail is quite prominent as it makes its way north.



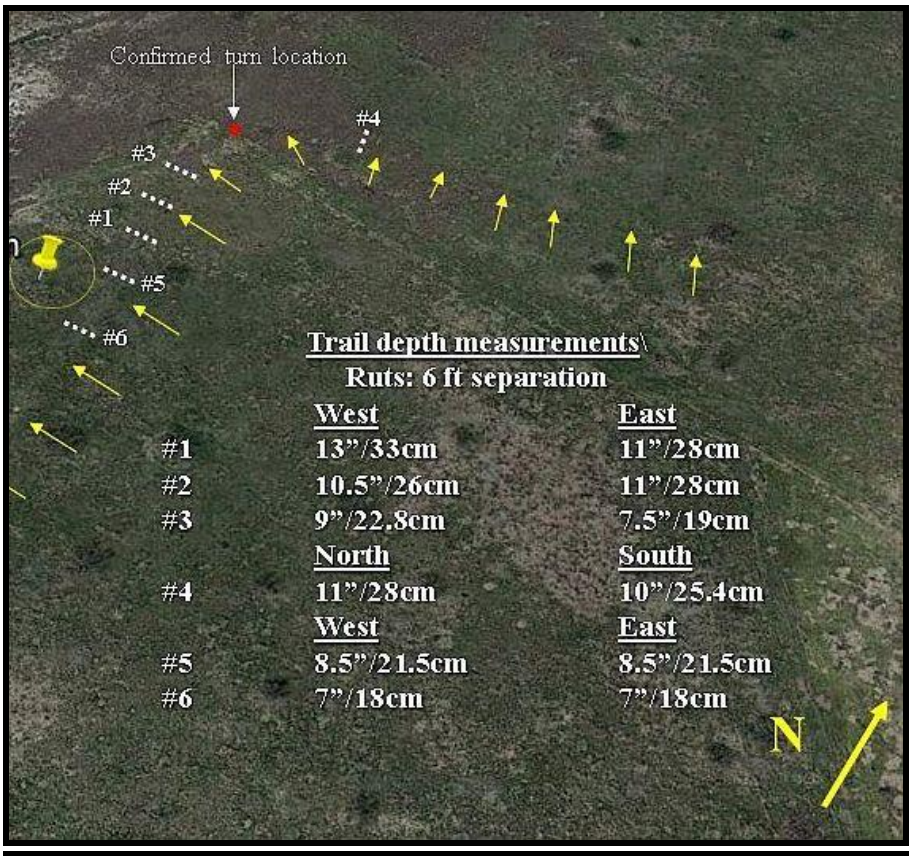
Butterfield Trail trace coming from south up Grape Creek (Google Earth)

At one point, the trail takes a 90-degree turn to head east up Butterfield Draw and up the hills. There is only one reason it would take such a sharp turn from the creek: the station has to be near the turn. This revealed the proper search location which ultimately led to finding of the site on the ground.

The trail throughout the Grape Creek area left a fairly deep depression in the soft soil. We would have to drive across the trail each day to get to the site, and the vehicle sensors in the front bumper would be set off each time we dipped down into the depression, which averaged seven feet wide and 9.5 inches below the rest of the terrain. At the point we drove through, it was 11 – 13 inches deep.

Depth of the trail depression is quite prominent (Front wheels in middle of trail)

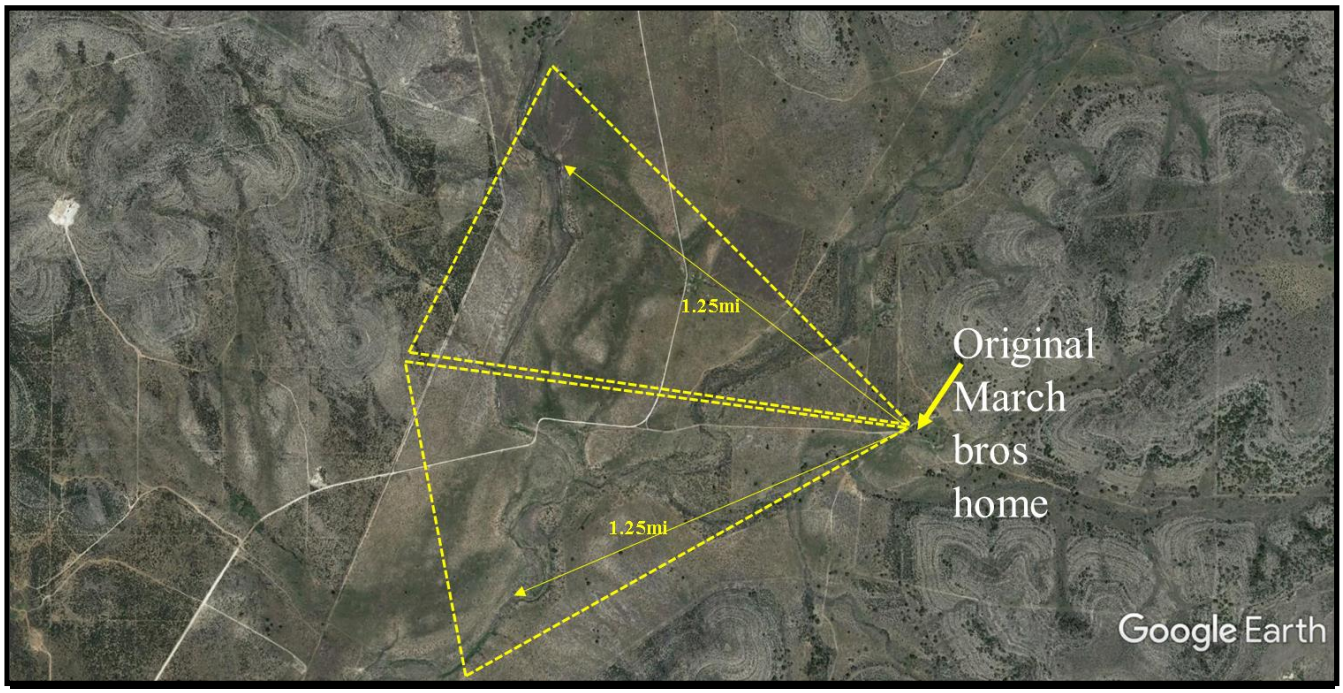
We walked the trail and made extensive measurements to confirm the imagery interpretation. The depression left in the ground is quite obvious in this area, to the point that we could determine the ruts within the depression. We measured these rut area depths compared to the surrounding terrain. We additionally confirmed the locations of where the trail crossed the ranch roads, heading both north and south.



Trail depth measurements (Google Earth)

The final piece to the puzzle and the answer to why so many who searched for the site previously could not find the station location is again based on the Conkling description of the location as recorded from their discussions with the March family during their travels through the area.

According to Conkling's notes, the location was **"approximately one mile and a quarter <u>southwest</u> of March brothers ranch headquarters."** Whether the notes were originally written down wrong or the notes were copied incorrectly when being prepared for their publication, it appears the compass description was incorrectly entered, and everyone searching previously was looking in the wrong location. The site was one mile and a quarter from the original March ranch house, but it was <u>northwest</u> instead of southwest.



Grape Creek Station in relation to original March ranch (Google Earth)

Grape Creek Station Archeology

Next to the trail and about 100 yards before the 90-degree turn, a very faint outline can be seen in the one particular satellite image of a circular corral. The circle is approximately 70 feet in diameter. Within that circle, we got our first metal-detecting hits. Both from the imagery and the layout of the artifacts this appears to have been a 20 X 15 foot shed within the corral, probably a supply and tack shed. The items found were square nails for construction of the shed, various pieces of metal band, metal tops of containers, small crushed cans, heavy gauge wire, and a piece of heavier gauge metal with a hand-punched hole.

Tack/supply shed location and artifacts

Just outside the area, we found a hand-forged Spanish Mule shoe. The mule shoe appears to have been removed due to wear rather than arbitrarily lost. There were no nails in the shoe and it had distinct wear and a crack in the middle of the worn area. This shoe is the exact same size as the mule shoe found during excavations of the Butterfield Station at Fort Chadbourne in 2008. (Reimenschnieder)

Hand-forged Spanish Mule shoe with crack and heavy wear

Spread around the corral area on the surface we found various pieces of bottle glass. Normally, finding glass bottle fragments in a corral would be unusual. However, Ormsby's account tells us that the station residents were living inside the corral in tents on the inaugural journey. They probably lived in there for quite a bit longer as they built the new cabin.

> ***Their corral was built of upright rough timber, planted in the ground. They had pitched their tents inside, for fear of the Indians, and took turns standing guard, two hours on and two hours off.***

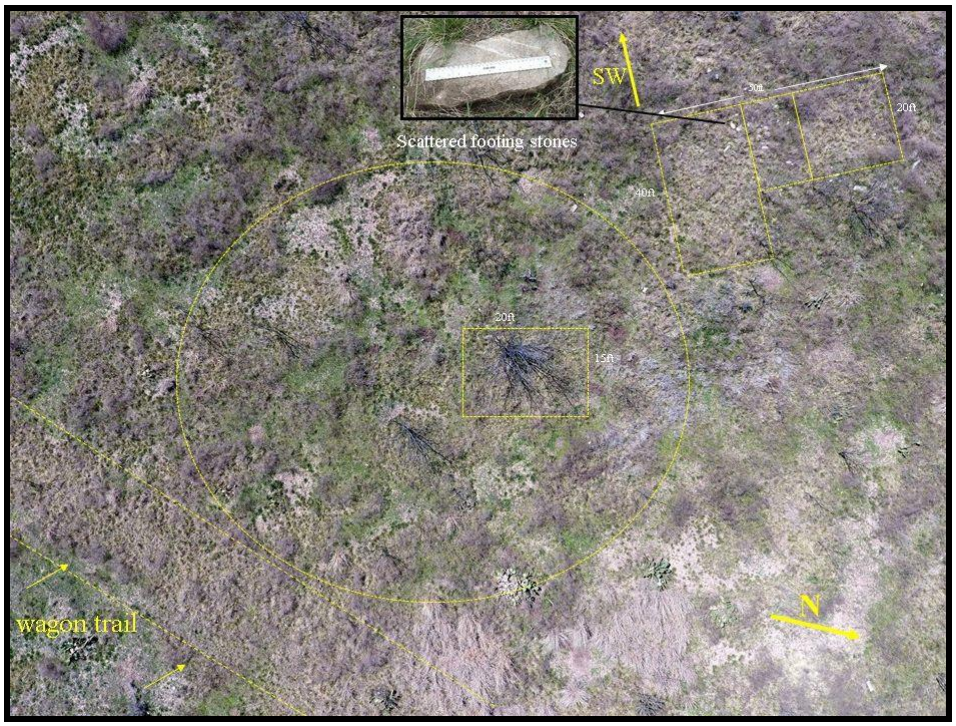
Later, a log cabin was built outside the corral, and the entire area was enclosed with a five-foot-high picket stockade wall. We know this from an account of Mrs. Emma Johnson Elkins in a 1911 Hunter's Magazine, published out of Ozona, TX. Mrs. Elkins lived on Fort Chadbourne at the time and this was an account of an Indian attack on the station that took place the day before they were to abandon the station from orders of the company. The route was being shut down due to the start of the Civil War. Although the Indian attack received attention in several publications afterward, the pertinent portion of her account follows.

One fusillade after another was fired at the house without serious results, the house being built of split logs and therefore bullet-proof, and the premises enclosed by a picket fence five feet high.

The first indication of where the cabin resided is based on the great number of cut footing stones strewn about a fairly small area, with many smaller cut stones of the same type.

Sampling of footing stones throughout cabin area

Similar to the vegetation being changed for the trail, the vegetation that grows back after a building has blocked out the sunlight for many years is also different than the surrounding vegetation. This cannot be seen by satellite imagery, but it can be seen by drone imagery, and in this case, it very clearly showed the right angles making up a three-room L-shaped dog trot cabin next to the corral. Together, 42 large-sized stones were found on the surface in the area of the cabin. Some of these were exposed during metal detecting digs. Smaller size stones, also flat on both sides, were too numerous to count. Note that the dog trot breezeway faces the optimum direction for the predominant wind from the southwest. This is the same layout for the dog trot cabin found at Johnson's Station, the next station down the line to the west.



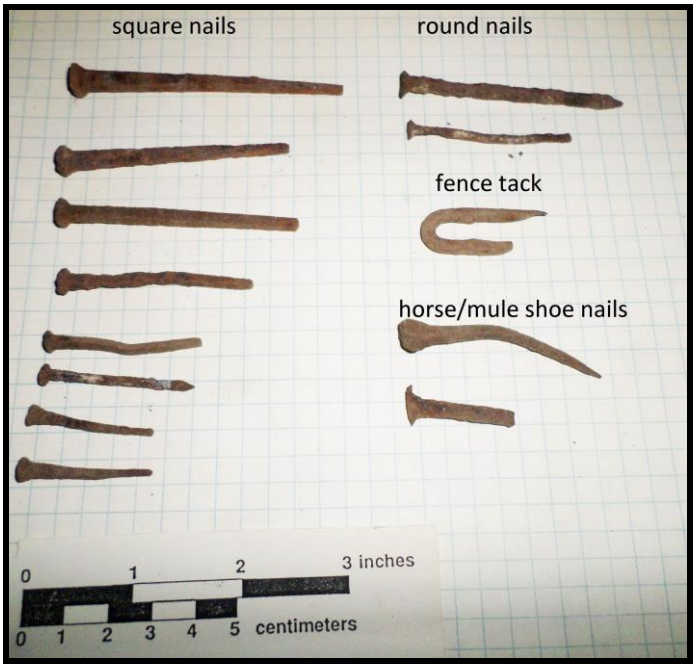
Drone imagery showing cabin area with footing stones

In and around the cabin area, we found hundreds of metal detection hits. Most turned out to be square nails of all sizes and flagging these locations confirmed the outline of the building as seen in the vegetation from above. The smaller nails were probably used chiefly for nailing down hand-cut shakes for the roof, which would explain the larger number found throughout. It can be speculated that the larger nails were for the main roof beams and probably the door and window frames since a split log cabin would not require much in the way of nails for the walls.

A few of the smaller nails turned out to be round. Given the probable construction period, this was, at first, a puzzle. Our research, though, indicates that round nails were being manufactured much earlier than previously thought. Several companies began producing round nails (called wire nails at the time) in New York in the early 1850s (Nelson).

The mule shoe nail below is one of the two we found outside the corral area and near the estimated cabin perimeter. These are mule shoe nails and fit the mule shoe we found perfectly. These two nails were cut, one at 28mm and the other at 27mm. There is a slight bend on the end of each nail, which was cut with nail cutters. It is important to note that the nails are in the same condition as when the shoe was put on. This indicates that a farrier removed them with the

removal of the shoe. Although it is possible this was done by someone traveling at a later time, it is much more likely that this was part of the standard activity by the station mule tenders while the stage was running.



Sample of the many nails found on this site

Notably, no window glass was ever found at this site. That fits with the period and the fact that this cabin was not intended as a homestead site.

The 44-40 was one of three cartridges of this type found at various site locations. According to the landowners, it is likely that this cartridge was buried deeply during the grubbing operation that occurred while clearing the field on two separate occasions. This would be an artifact from the post-abandonment/camping period.

The large amount of mortar/plaster found in the shovel tests and throughout all the digging in the cabin area is also significant. A great deal of it came out of almost every dug hole in the area of the cabin. The term mortar/plaster is due to the fact this is not mortar in the traditional sense or of the kind normally found, for example at Fort Chadbourne. Some unearthed stones were covered in the mortar/plaster substance, along with a slice of pure mortar coming out of the one hole.

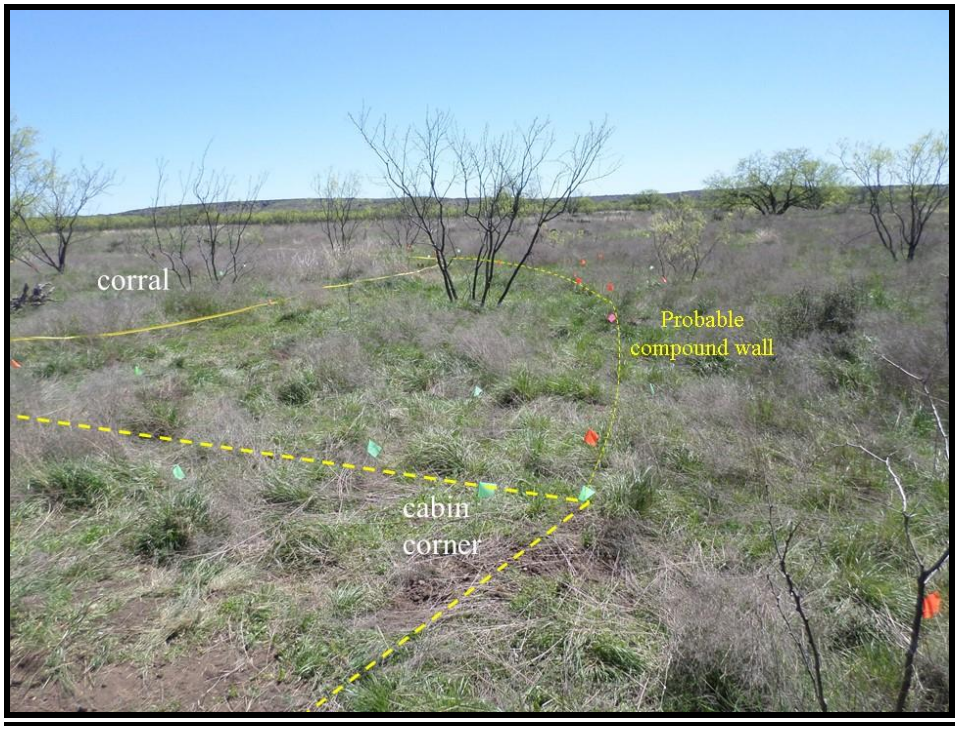
These stones were likely used to build the fireplaces; one on each end was typical. The smaller stones, which are all flat on both sides, were mortared/plastered as they were placed. Most were not exposed to high heat, but we found fire-cracked limestone spread farther out from the cabin area. At first, we thought this might be remnants of Middle Archaic Indian encampments since there was abundant evidence of stone tools and a few diagnostic points throughout the area. However, we found one very large cut limestone block that was fired and had mortar/plaster on it. This was probably one of the main fireplace blocks, which strongly indicated that the smaller fire-cracked rocks were also part of the inner fireplace construct and had been spread from the ranch clearing operations. The smaller stones were probably the outer portion of the fireplace that was not exposed to the high heat.

Mortar/plaster on stone, slice of mortar/plaster, and various chunks

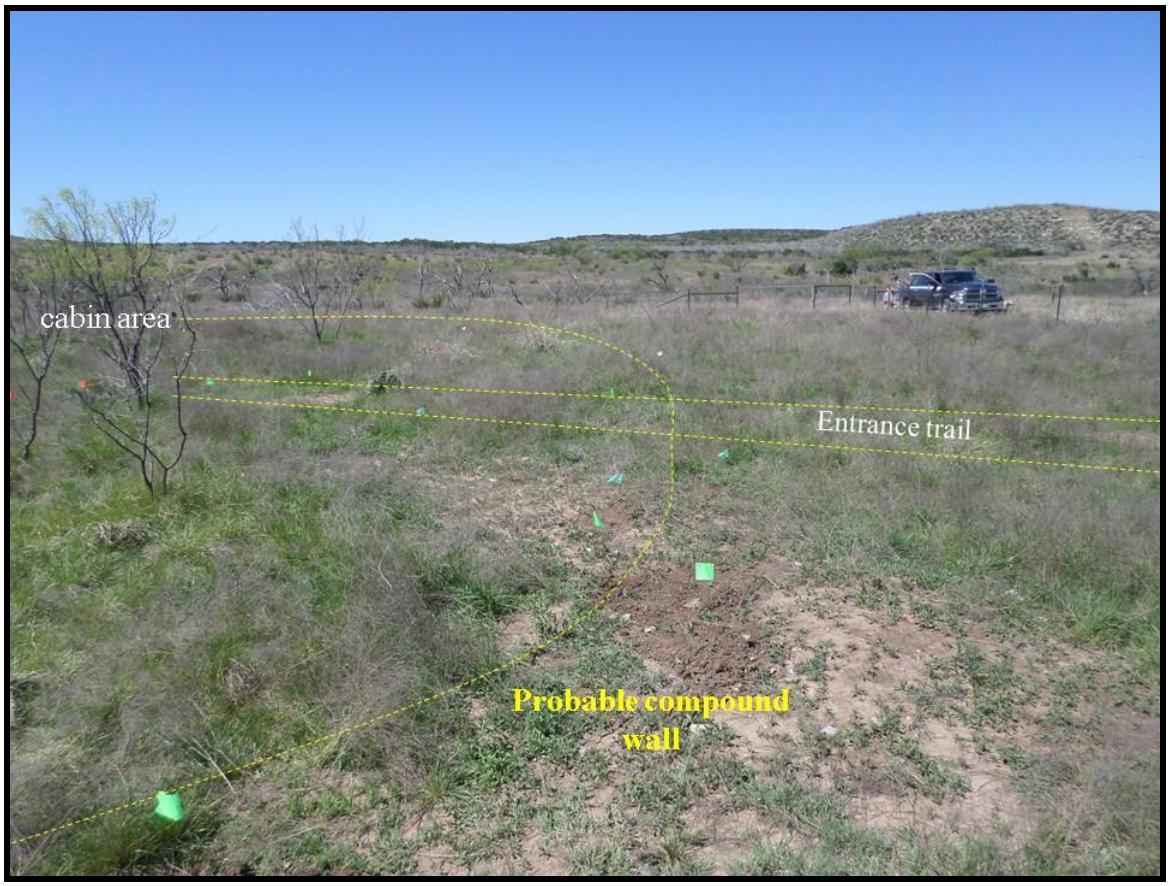
Large cut, fire-heated limestone block

Mortar on side and top of large limestone block

As reported by Mrs. Elkin in her account, after the cabin was built a stockade type wall was added using a picket wall construct. A faint outline of this wall and the entrance trail from the main trail can be seen in one particular satellite image. The entrance trail leads up to the cabin. It appears they extended from the corral to the cabin on each side for the stockade in a circular fashion. Flagging the nails that were metal detected tends to support this outline seen in the imagery.



Probable south compound wall shown by flagged nail areas



Probable north compound wall shown by flagged nail areas

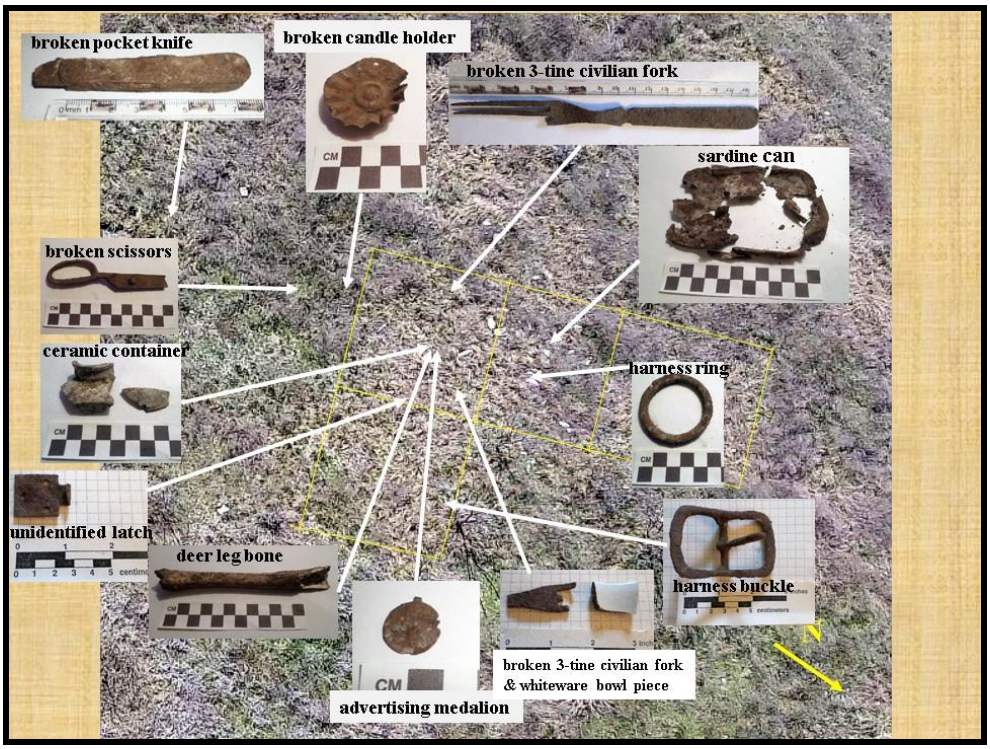
Outline of entire stage stop with stockade wall (Google Earth)

Grape Creek Station Artifacts

Similar to Johnson's Station, the next station down the line, the artifacts found at this location represent multiple periods. There are the artifacts that would fit the period the stagecoach was active, and there is the post-stage station period, which represents camping for those using the old stage road.

The artifacts that fit the stagecoach period are limited. This is because the owners were ordered to pack up and leave the station in the spring of 1861. Within their account of the Indian attack conveyed by Mrs. Elkins they commented that their wagon was packed and they were to depart the next morning. After the attack, a contingent from Fort Chadbourne was brought back to the station to render medical aid and assist in transporting them back to the fort. So, we know they departed and took all their possessions with them. The only artifacts left to find are those they purposely discarded as trash.

The numerous square nails used to construct the cabin were obviously of proper period. Beyond that, most of the items of proper period were found in or very close to the estimated cabin perimeter. The following shows the artifacts and where they were found.

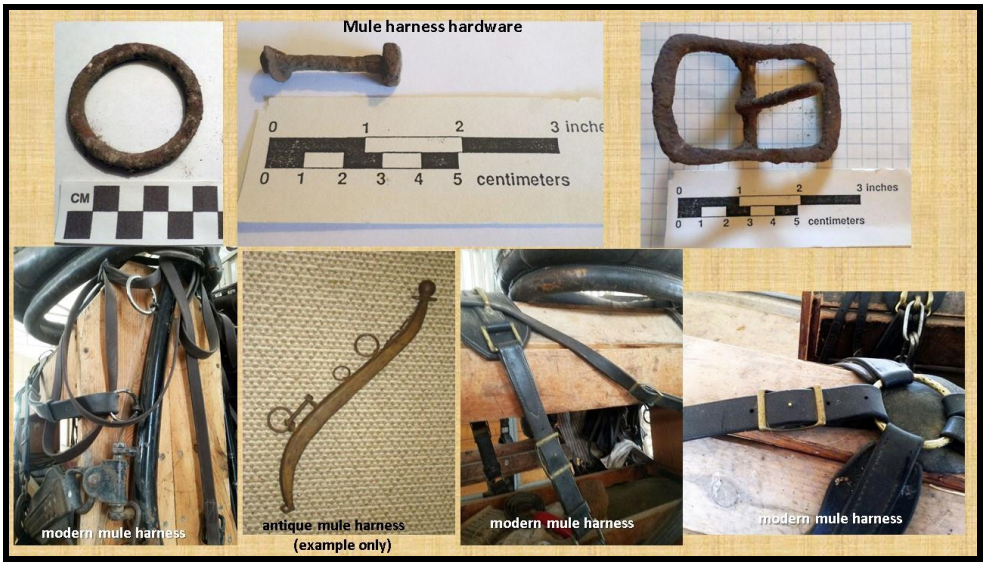


Artifacts in and around cabin area of probable Butterfield stage period

Some large pieces of whiteware were also found in an area just in front of the building perimeter. One was an identifiable piece of dish, and the other had a partial stoneware stamp on it. The maker's mark is from L.F. Field, Utica, N.Y., produced 1860 – 1870 (Pottery Magic).

Whiteware dish pieces and partial stoneware stamp

In addition to the hand-forged mule shoe found near the corral, three items, in particular, appear to be mule harness hardware. Those are the harness buckle, harness ring, and a hand-forged square head hinge pin for the mule yoke. The buckle and ring were both found within the cabin perimeter. The hinge pin was found out by the area that would have been the stockade gate for the wagon to enter. The hinge pin is smaller than most mule yoke hinge pins. This can be explained by the smaller size of the Spanish mules being used for this portion of the stage route.



Mule harness hardware (artifacts top, examples bottom)

Post Stage Station Period Artifacts

After the stagecoach site was abandoned it continued to be used by travelers. Some of the items found were obviously from this later period. None of them point to any permanent habitation. One of the things we did not find is just as important as the things we did find. That is, we did not find window pane glass. This supports the proposition that this was never a later-period home structure. One of the things people usually would do when trying to homestead would be to add windows. This was not the case at this location.

Two military camping periods were found – Fort Chadbourne and Fort Concho periods. A 50-70 cartridge matched a similar one found at Johnson's Station on the Middle Concho River in 2006. This was a Berdan-primed, raised-ring centerfire cartridge. This is also identified as UMC Ringed Folded Head. This was the earliest of the .50-70 Government cartridges. It was a black powder round adopted in 1866 for the US Springfield Model 1866 Trapdoor Rifle.

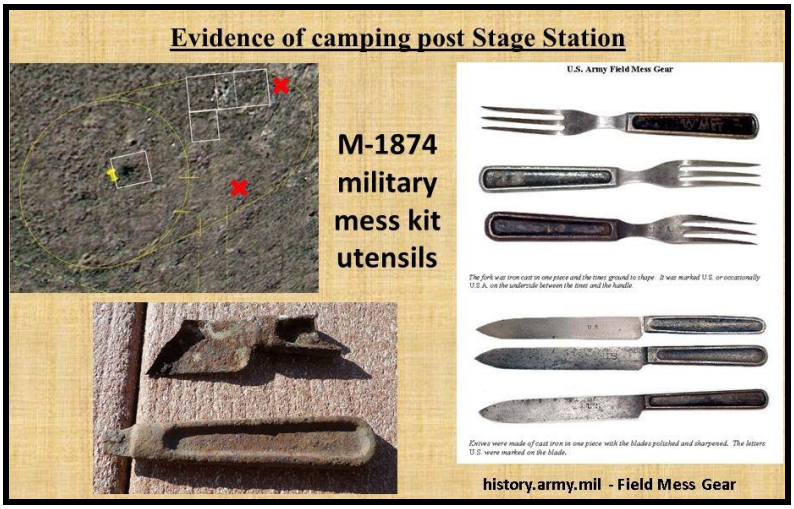
50-70 Military cartridge

There are two possibilities for this type of cartridge being at these two locations. One is a unit from Fort Chadbourne and one is a unit from Fort Stockton.

In June 1867, Lieutenant Boehm left Fort Chadbourne with a detachment of 40 men and followed the Butterfield Trail down to the Middle Concho. They set up what they called 'Permanent Camp' at the location of Johnson's Station. Basing out of this location, they escorted cattle herds to the Pecos for one month, when they were relieved by G Company of the 4th U.S. Cavalry. This rotation of company-size detachments continued for six months into November 1867, when Fort Chadbourne finally closed and moved to start up Fort Concho the following month. (Haley, Taylor)

The other possibility is the unit from Fort Stockton led by Brevet Lieutenant Colonel Strang on his march to Fort Chadbourne in October 1867. Both these units probably camped at the Grape Creek site, as it is approximately eight 8 hours by wagon between this site and the next stage site, Johnson's Station. It should be noted that a similar cartridge was found at the Johnson's Station site.

The other military artifacts found at this site come from the Fort Concho period. A broken knife and fork from an M1874 military mess kit was found at two separate locations within the estimated compound walls but not within the estimated building perimeter.



Utensils from the M1874 mess kit

This site did not show up in any Fort Concho patrol reports. However, it was known to be a temporary camp for soldiers from Fort Concho passing this way. It is unknown how long this building was standing and useable. It could have eventually been washed away by some of the massive floods reported in the early 1900s. The landowner told us she had been riding along this creek since she was a teenager and never saw the remnants of the station.

Other camping items found appear to be civilian in nature. We know this road was used extensively after the Civil War by immigrant wagon trains and cattle drives. For the trail drives the name changed to become the Goodnight-Loving Trail.

The 44-40 was the most popular cartridge of the 1870s. Three were found at this location, and six were previously found at Johnson's Station. These particular ones were stamped Winchester

(WRC). The primer is missing in one cartridge, but based on the hammer pin indentation comparison, the other two were not fired from the same gun.

Except for one 44-40 cartridge, the camping items appeared to be outside the building perimeter and spread around. In addition to the 44-40 cartridge a UMC 12 gauge 'Club' shotgun shell was dug up in the area of the cabin perimeter. The UMC Club double ring was the first in the Club family of shells. It was a black powder shell and was the first generation of Club shells. It was produced between 1885 and 1).

44-40 cartridges

One of the three medicine bottle tops found matches one of the most common Sarsaparilla bottles manufactured and most likely dates between the late 1890s to early 1900s. (Lindsey) A second does not appear to be hand-blown, making it probably the same general era as the Sarsaparilla bottle. A third could not be unidentified.

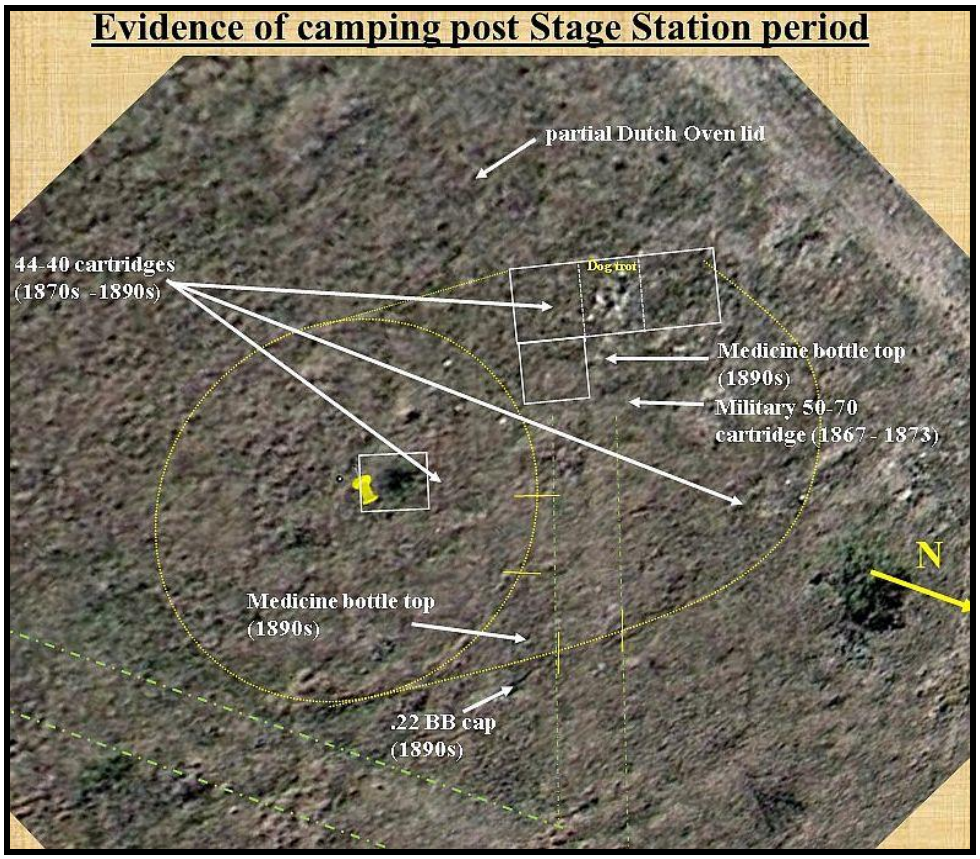
Medicine bottle tops (left bottle is Sarsaparilla)

A Dutch oven lid was found in an area that would considered completely outside the compound. Dutch ovens were the primary cooking mode for wagon trains and cattle drives.

11-inch Dutch oven lid

Solder top can lid

Closer to the creek, we found a solder-top can lid. These were common from the 1870s to the 1890s, often with military units. However, it could also have been any camping person of that period. The lid was cut off below the seal.



Locations of probable camping artifacts (Google Earth)

Summary Of Findings For Grape Creek Station

The Butterfield Overland Mail's Grape Creek Station was located exactly where those with first-hand knowledge described it. And it was also constructed exactly as described. Time, floods, fires and modern ranching had almost removed all trace of it. Only a close inspection using new technology and following clues from our long-ago travelers could help find this elusive ghost of the past. To the casual eye, nothing is left and there hasn't been for a long time. The owner stated she had ridden up and down this creek as a young girl and had never known of or seen this site.

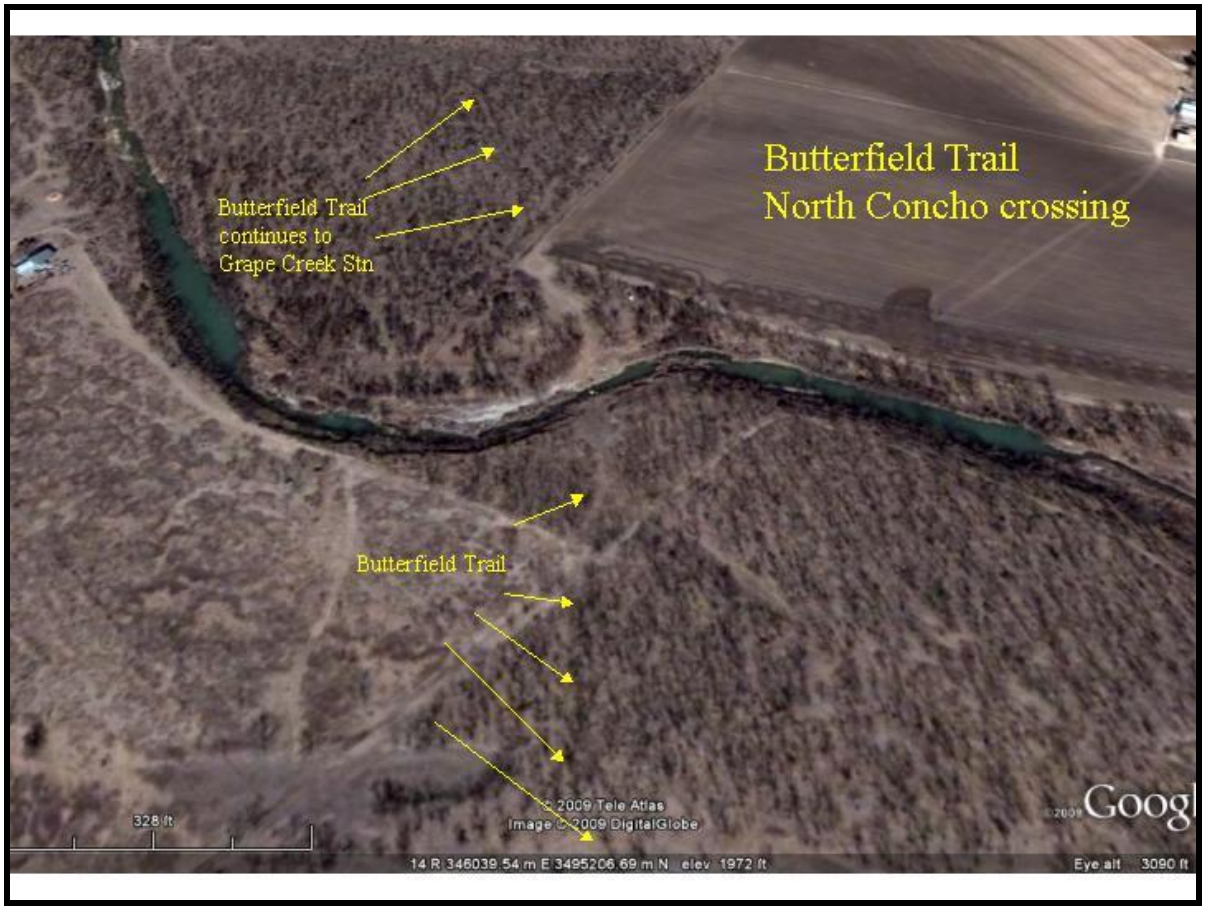
Although this primitive station only stood for a little over three years, it profoundly affected the opening of the West and tied together our country across vast distances of a harsh and unforgiving land. Only the hardiest could build something out of nothing while withstanding everything nature and a hostile Indian nation could throw at them.

For the weary travelers, it was a small spot where they could find peace and respite, sitting on the banks of a clear, spring-fed creek under the shade of lingering pecan trees. I'm sure many who came to this spot in covered wagons after the station was abandoned stayed more than just one day, knowing the next part of their journey would be unforgiving.

The location has been lost for the better part of 70 years, and it was important to find it and pull from the ground what small bits of the past we could. We can now let the past go back to sleep and let the land continue on its path of reclaiming what it owns and what we only borrow and then return.

5. The North Conch River Butterfield Trail Crossing

After leaving the Grape Creek Station, the trail led down to the North Concho River through what is now the town of Carlsbad. This information is fairly well documented, and the trace validated the reported route. The actual crossing site was where the information differed from the trace as seen by satellite. According to Conkling, the original crossing was "where the ruins of the first concrete bridge over the river may be seen." Undoubtedly, there was a crossing at that location, but it was not for the Butterfield Trail. He mentioned two other crossings that were also not for the Butterfield Trail. The actual trail crossing was 1.2 miles southwest of the town of Carlsbad, close to where Mule Creek empties into the North Concho. This crossing is verified by continuing to follow the trail south of the crossing as it leads down to the Middle Concho River and eventually to the next station, Johnson's Station.



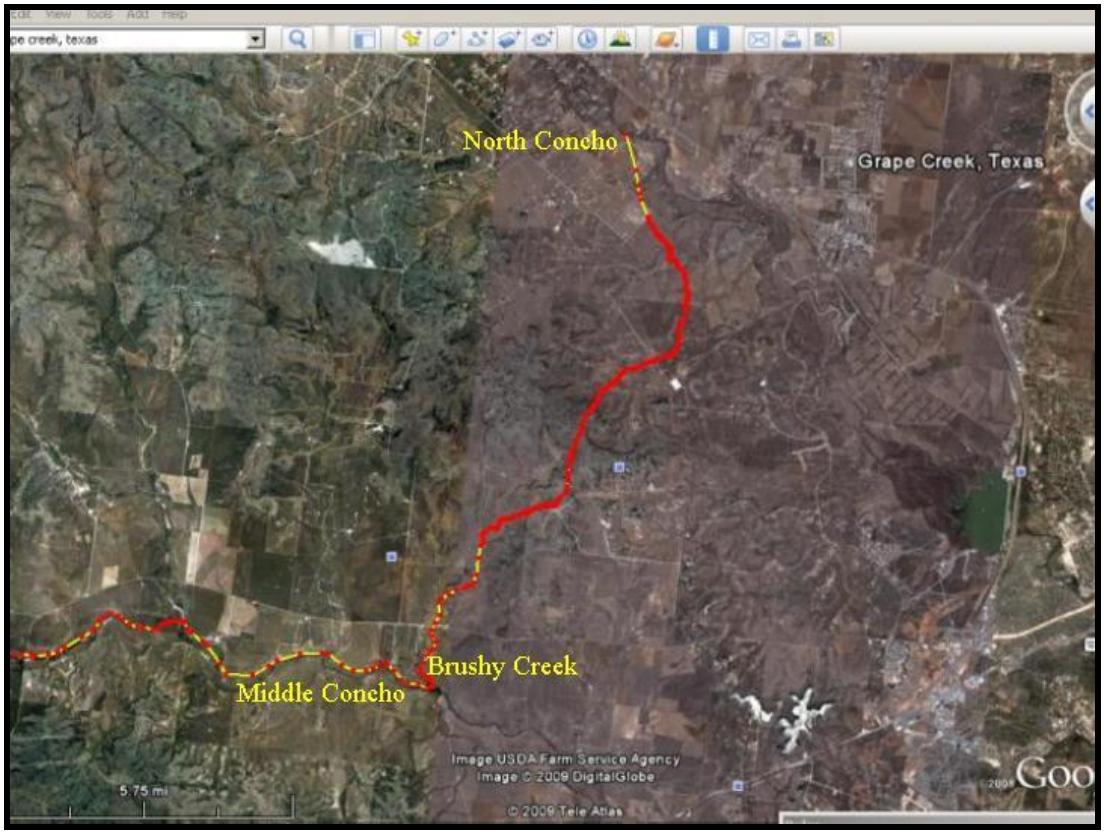
North Concho crossing of Butterfield Trail (Google Earth)

Old cut in bank on south side of North Concho River crossing

Trail heading south from North Concho River crossing (Google Earth)

From the North Concho, the trail ran through the dry country down to the Middle Concho River. Again, Conkling made an educated guess on where the trail came down to meet the Middle

Concho, stating it was a "short distance east of the site of the old Arden post office." It crossed Arden Road, following alongside Brushy Creek down to the river. As the trail continued down the Middle Concho River, it came to Johnson's Station.



Entire trace of Butterfield Trail as it comes from North Concho and continues down Middle Concho River (Google Earth)

6. Archeological Investigations of Johnson's Station (41IR123) Irion County

Although there have been numerous references to Johnsons's Station by historians of the Butterfield Trail and Fort Concho, the location slipped away in history. Research of publicly available maps and publications gave a generalized area to begin searching. High-resolution satellite imagery, newly available to the public, helped narrow the probable location by following the trail trace. The landowner was contacted and agreed to a survey to be conducted. On our first survey, an unknown historic site was found with white-ware pieces, metal, and many stones scattered around that looked to have been used to construct some portion of a building. Additionally, a brush pile nearby had larger stones that were fired as if they might have been

used for a fireplace or hearth. When this information was presented to the landowner, whose family had owned the property since the late 1800s, he indicated there was no known site at that location. Thus began an extensive survey, eventually revealing a much more extensive site of Johnson's Station.

Johnson's Station was the second relay station for the Butterfield Stage line heading west after leaving Fort Chadbourne, Texas. It was one in a series of stations for the stages crossing West Texas on the way to or from the Pecos River and New Mexico between 1857 and 1861. It was located on the Middle Concho River after a southwesterly crossing of 32 miles through the dry West Texas land from the previous Grape Creek Station. Coming from the west it was the next station after the Head of the Concho station. Although neither Fort Concho nor San Angelo existed at the time, the location resides just over 20 miles west of these current locations.

Johnson's Station - Butterfield Overland Mail route

This entire area covers approximately five acres. It is bordered on the eastern side by a shallow draw, on the northern side by a slight rise and open ranch land, on the southeastern side by a 25-foot deep draw, and on the south side by a large area of pecan and oak trees. It is in an active floodplain with low hills to the north and south. The main area of interest and the western and northern areas are open fields cleared of cedar and mesquite by the landowner and pushed into

brush piles. In the 1800s, this area would have been open prairie. The elevation is 2,050 feet. The Middle Concho River lies approximately 700 feet south of the main building area and 300 feet south of a former second building area.

There is much confusion throughout the history books and articles over the years about this small station west of San Angelo. Many historians confused this station with Camp Johnston on the North Concho River. Camp Johnston was never a stage station. It was the military camp that preceded Fort Chadbourne. Some have also confused the name with Johnston's Station. This is based on the same confusion but mixes names from each location. First-hand reports of the time represent the name as Johnson's Station or Johnson Station. Finally, some confuse the Middle Concho Johnson's Station with another Johnson's Station located in Tarrant County, just south of present-day Arlington, Texas, located between Dallas and Fort Worth.

Johnson's Station Butterfield Stage Period

It was a Friday afternoon in March 1857 at Johnson's Station on the Middle Concho River, and the stage was due anytime. Johnson's Station was a small line station, just enough for a quick meal and change of mules. Mr. and Mrs. Evaness ran it with five other hands. Suddenly, a large group of Comanche appeared out of nowhere. The Indians tried stealing the mules, but they were hobbled with chains and locks, so they killed them. Then, they turned their attention to the station. The men and one woman barricaded themselves into one side of a double log cabin separated by a 10-foot breezeway called a dog trot. The Indians looted one cabin side that was not barricaded, which included the kitchen. However, they were not satisfied and began using flaming arrows onto the roof to force the occupants out of the barricaded side. The station workers yelled out in Spanish that they were well-armed but would not fire on the Indians if they let them go. The Indians agreed, but when Mrs. Evaness emerged one of the Indians said in English that the white woman was beautiful and he wanted her for his own. Mr. Evaness heard the comment and killed the Indian on the spot. The employees ran for cover in a grove of trees with the Indians firing on them. Mr. and Mrs. Evaness were wounded, and things were not looking good. Just at that time, the stagecoach appeared on the road. Thinking the coach might be bringing troops from Fort Chadbourne, the Indians quickly departed. (Wilbarger)

Such was life on the Butterfield Stage route from 1857 to 1861. Although the larger stations, such as Fort Chadbourne, were what folks saw on the route schedules, they needed stations spaced approximately 30 miles apart to relieve the mule teams. After Fort Chadbourne, the travelers first came to the Grape Creek Station and then to Johnson's Station.

Another account in October 1859 by a traveler went like this.

> ***"Our spirited little landlady, reared in eastern Texas, gave us a description of an attack on the station by one hundred twenty Comanche who were held off by the stock tender, her husband and herself three weeks before." The lady declared, "We won't be driven out by worthless red-skins."***

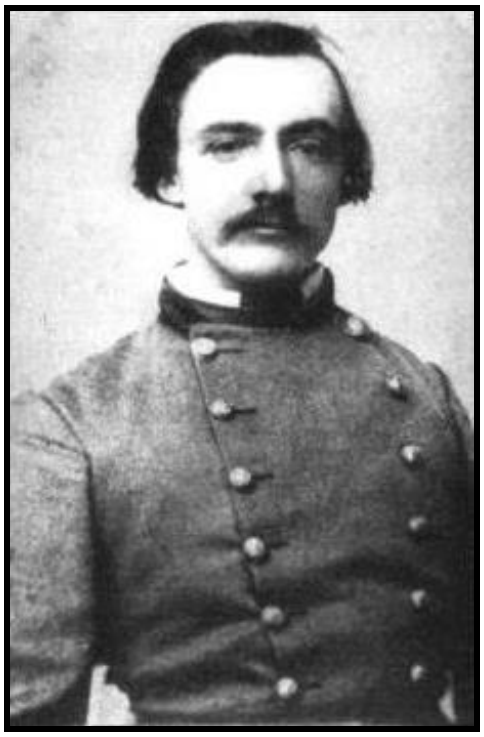
The traveler also noted iron-pointed arrows with feathers were still sticking in the cottonwood log fence that surrounded the station. (Haley, Green) The reference to cottonwood logs was probably a misidentification of the Pecan trees by someone unfamiliar with the area.

Cottonwood tree **Pecan tree**

The Butterfield Overland Mail schedule called for stagecoaches to pass in each direction twice weekly. For Johnson's Station, the coaches would arrive Tuesdays and Fridays heading west and Wednesdays and Saturdays heading east. The entire trip took 25 days in one direction.

Adam Rankin Johnson

Adam Rankin Johnson acted as county surveyor and agent for the Butterfield Overland Mail as far west as El Paso and became a stage driver for the company. Although he did not purchase the land for Johnson's Station he did purchase several other sections of land along the Middle Concho River. It was likely Johnson that first chose the location for the mail station, probably owing to the name Johnson's Station. When the Civil War broke out, Johnson joined the Partisan Rangers of the Confederate States Army, later reaching the rank of Brigadier General. After the Civil War, Johnson founded the town of Marble Falls, Texas



Adam Rankin "Stovepipe" Johnson

Some researchers speculated that the station moved shortly after its initial service with the Butterfield Overland Mail, but no records support this theory. Logic also dictates that this small group had neither the time nor the security to build an entirely new station while at the same time keeping their stock tended and maintaining the station schedule. The Middle Concho Johnson's Station probably served the Butterfield (later Wells Fargo) mail and stage route until the line was shut down in 1861 due to the onset of the Civil War. However, the historians weren't completely wrong. Johnson's Station probably did move up river in a later period, after the Civil War.

Ben Ficklin Mail Station (Johnson's Station #2)

The move of Johnson's Station took place when the Ben Ficklin (San Antonio To El Paso) mail route started up after the Civil War in 1868, connecting into the old Butterfield Trail after leaving Fort Concho (San Angelo). The stage would leave the Ben Ficklin stage station a few miles south of Fort Concho and drive to the fort to pick up passengers and mail before heading west to follow the old Butterfield Trail to the Pecos River and on to El Paso. The original Johnson's Station was located at the best location possible within the maximum range set for the mules to be relieved for the Butterfield route coming from the north. In this case, it was 32 miles from the Grape Creek Station. The next stop after Johnson's Station was Head of the Concho Station, a distance of 32 miles again. When the Ben Ficklin line began, they must have realized the first stop was too short from Fort Concho – only 22 miles. So they moved it farther upriver to even out the spacing between stations to 27 miles apart. They kept the same name and called this second stage station Johnson's Station. Land deeds support this new location's successive ownership by various Ben Ficklin stage line partners. A detailed satellite imagery search of the later station and the 'Grierson shortcut' portion of that road revealed the likely location of this station at the proper distance from Fort Concho and indicated on the land deeds. The commander of Fort Concho ordered the shortcut. (Temple) The Grierson cutoff begins on the east side three miles from the original Johnson's Station, bypasses it heading west, and then another five miles to the second Johnson's Station.

US Cavalry, Fort Chadbourne

During the same general time frame that the Ben Ficklin line was getting started, the original Johnson's Station probably served as a military camp by units from Fort Chadbourne. In June 1867, Lieutenant Boehm left Fort Chadbourne with a detachment of 40 men and followed the Butterfield Trail down to the Middle Concho. They set up what they called 'Permanent Camp' listed as 18 miles from the junction of the Middle and North Concho Rivers. This is the location of the original Johnson's Station measured by the trail running along the Middle Concho River to the junction of the two rivers. Basing out of this location, they escorted cattle herds to the Pecos River for a deployment period of one month, at which time they were relieved by G Company of the 4th U.S. Cavalry. This rotation of company-size detachments continued for six months into November 1867, when Fort Chadbourne finally closed and moved to start up Fort Concho the following month. (Haley, Taylor)

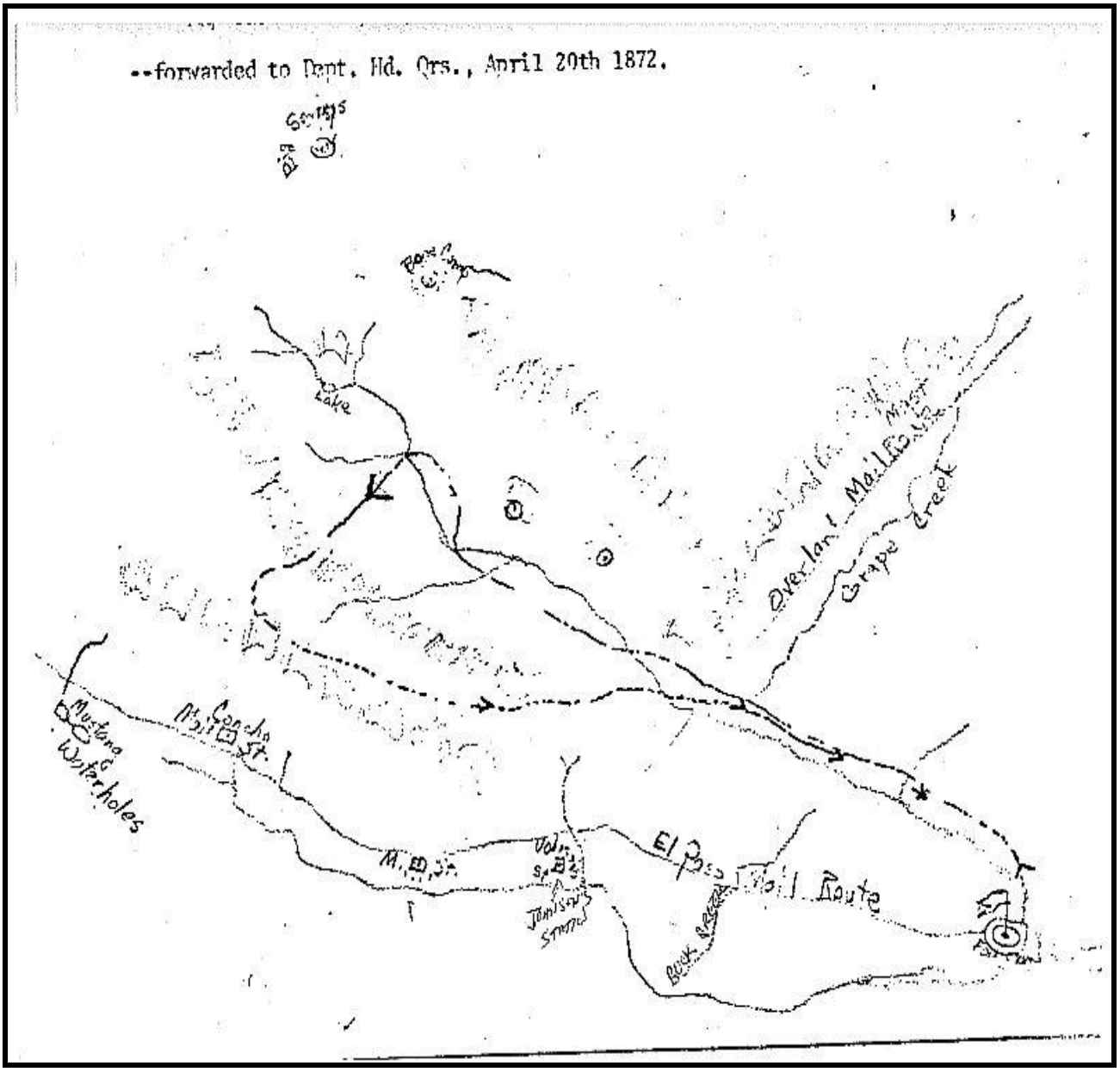
US Cavalry, Fort Concho

After Fort Concho was established the troops again took up the responsibility of protecting the Ben Ficklin mail line and escorting cattle drives. In June 1869, soldiers began permanent picket duty at the new Johnson's Station #2, set up by the Ben Ficklin line. In December, the commander of the Pecos Region instructed the Fort Concho commander to build permanent quarters at the station – a building with a pole roof covered with mud or unformed adobe that could overlook the corral. The picket outpost consisted of one noncommissioned officer and four privates from Fort Concho. (Concho)

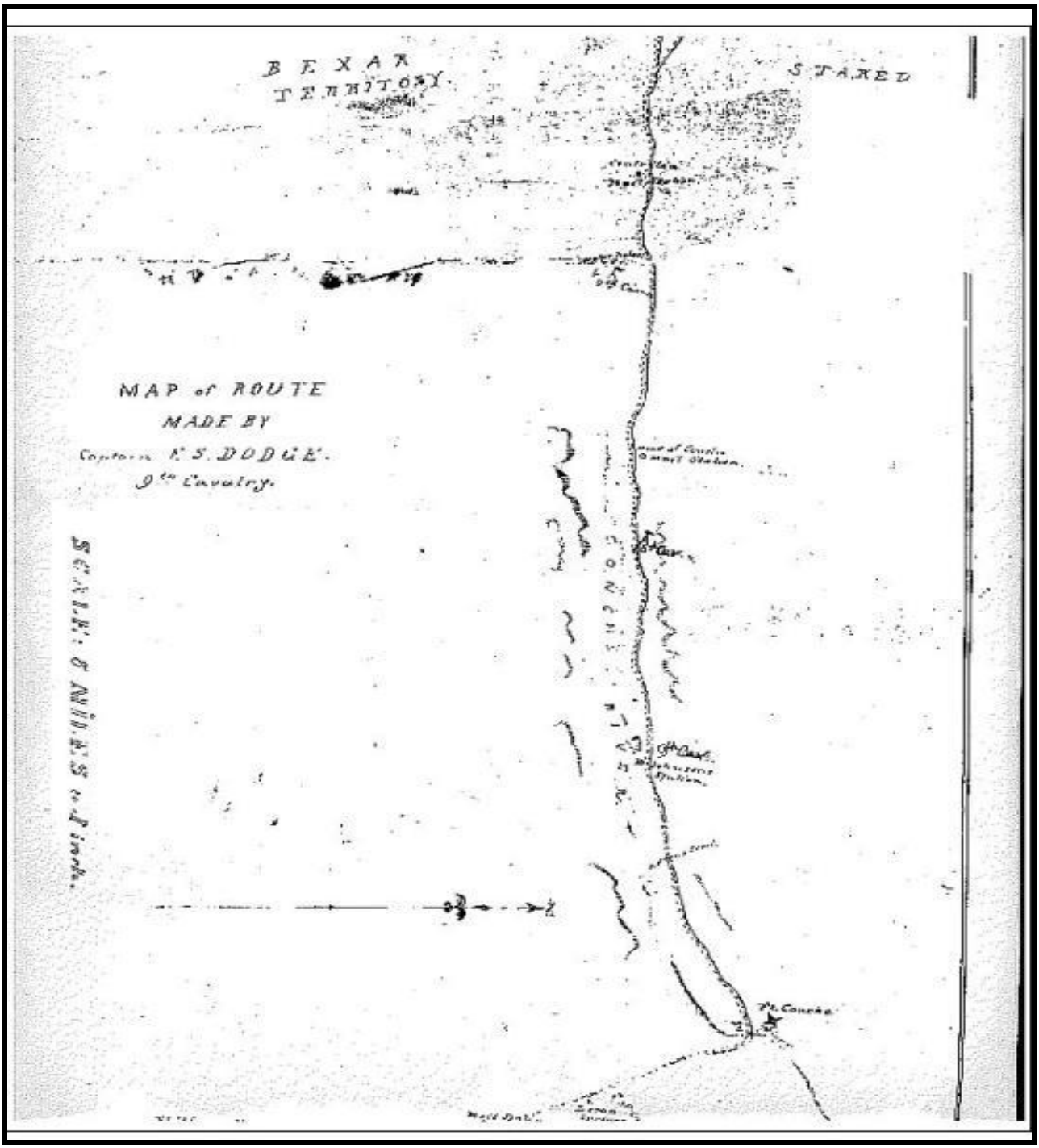
One day, just before Christmas in 1869, a band of Indians hit this mail station and ran off five cavalry horses. The raid brought a quick reaction. Fifty troopers rode out of Fort Concho in pursuit. To forestall further raids, the command later dispatched a lieutenant with two sergeants, two corporals, and twenty-three privates of E Company, Ninth Calvary, plus a hospital attendant, headed for Johnson's Station. They planned to stay for at least a month, scouting the region vigorously for hostile bands. (Uglow) Likely, this large detachment once again took advantage of the original Johnson's Station location as its base of operations and artifacts, reported further down in this report, found at the station tend to support this.

Documents from Fort Concho indicate that both Johnson's Stations were well known and referenced by cavalry scouting parties well into 1879. A scouting map of 1872 shows Johnson's Station and two mail stations further on, one of which is Head of the Concho and the other the newer Johnson's Station, but designated only as "mail station." Another 1874 scouting map shows units of the 9th Cavalry camped at Johnson's Station and the 10th Cavalry at Camp Charlotte, but nothing is listed at either of the mail stations. Since mail station guard detachments were constantly detailed to the mail stations during this time, this map was probably intended to show only the cavalry camp locations, one of which being the original Johnson's Station. The map also gives a scale of miles, correctly matching the 9th Cavalry location to the original Johnson's Station. Finally, an 1879 scouting report states the detachment passed the "old and the new Johnson's Station" on their way out to Camp Charlotte. Additional evidence of the newer station maintaining the Johnson's Station name comes from multiple reports referencing Johnson's Station and the distances marched from known points to the station. Six reports give the correct distance to indicate they referenced the newer mail station location.

These reports covered the periods of 1872, 1877, and 1879. Two reports give the correct distance to indicate they referenced the original Johnson's Station. These reports were dated 1874 and 1879. (Concho)



1872 scout map shows old Johnson's Station and the new mail station. Author annotation for clarity of old Johnson's Station (Fort Concho archives)



1874 scout map shows cavalry at two camp locations (Camp Charlotte, Johnson's Station) but does not convey the infantry detachments during that period at both the new mail station and Head of Concho mail station. Distance is correct for old Johnson's Station. (Fort Concho archives)

In 1882, all outposts were abandoned, as the new railroad line reached El Paso, and the stagecoaches were no longer needed for passengers or mail.

Johnson's Station Ranch Period

The current landowner's family purchased the property on which the old Johnson's Station was located in the late 1890s. There is no family memory of this location ever having a structure or being occupied. In recent years the area had been bulldozed for brush clearing. The known location of the original ranch house is designated 41IR118, located approximately one mile upriver and slightly farther inland. It consisted of a pier and beam ranch house with a well and large cistern, sitting on a slight rise approximately a quarter mile from the river.

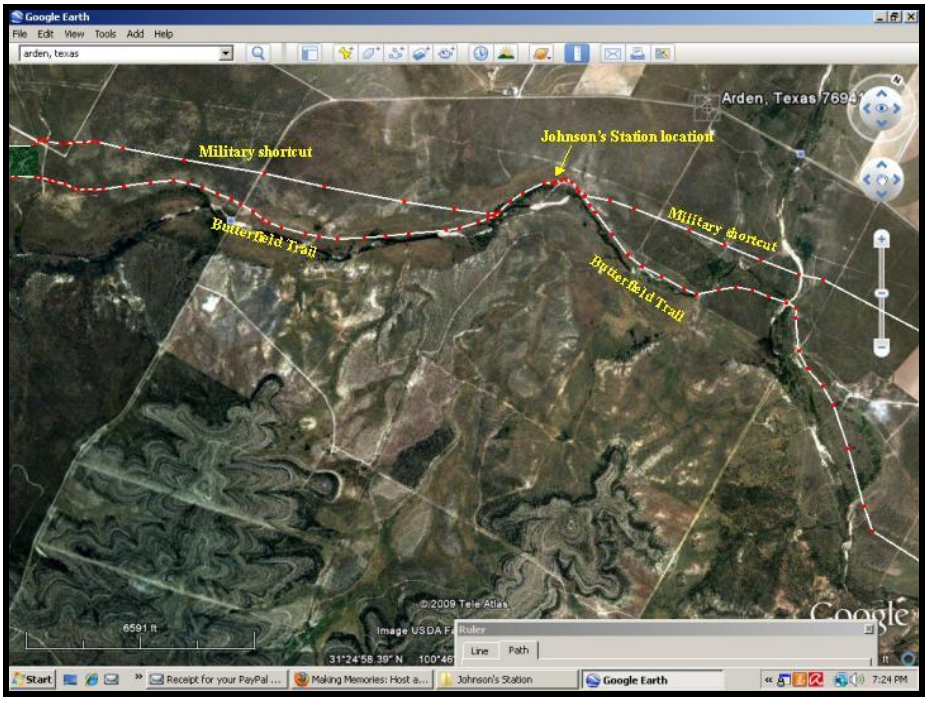
From the mixed period of artifacts, some were quite obviously ranching artifacts; coming out of the Johnson's Station site, it appears that in addition to the Butterfield and cavalry period of 1857 – 1882, at least one period in the late 1880s or 90s, this location must have been continuously occupied for a short period. This may have been by the partner in the original purchase. The current landowner's grandfather lived in town with his wife and family before moving to the ranch, probably after the main ranch headquarters was built. However, there is no documentation of where his partner in the land purchase resided after the purchase.

Butterfield Trail and Fort Stockton/El Paso Mail Road

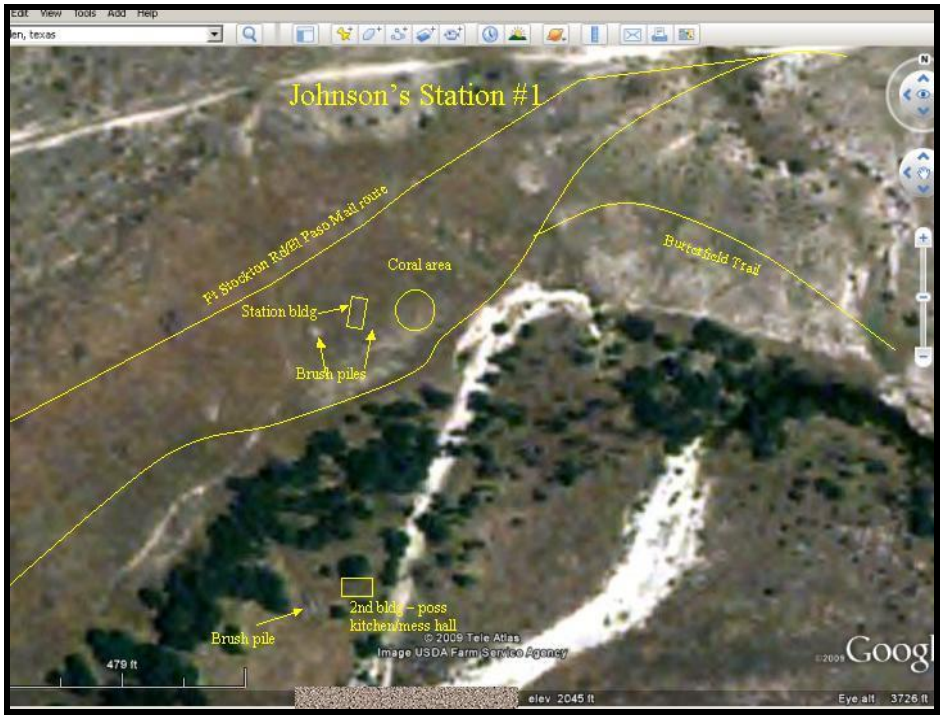
Interpreting the two major trails through the area was as important as the station location. In addition to helping determine the likely location of the station, the trails helped to confirm it since they had to run right through or past the station location.

Two trails run along the Middle Concho River. Fort Concho records revealed that a second trail was built by the military to ease the travel on the wagons and shorten the distances. Soldiers referred to this second trail as either the Fort Stockton Road or the El Paso Mail Road, also known as Grierson's Shortcut. The newer section of the trail shortcuts the older Butterfield Trail. This is the shortcut referred to by Colonel Grierson in his 1872 writing. The two come within 300 feet of each other in the area of the original Johnson's Station. There is a deviation of the newer trail at that point that goes to the station.

Some current topographical maps list this trail as the Butterfield Trail. However, the Butterfield Trail followed the winding river, while the newer trail was very straight and usually ran about a half mile away from the river. In the area of the newer Johnson's Station upriver, the trails merged, and from that point west, it remains the same trail as the original Butterfield Trail.



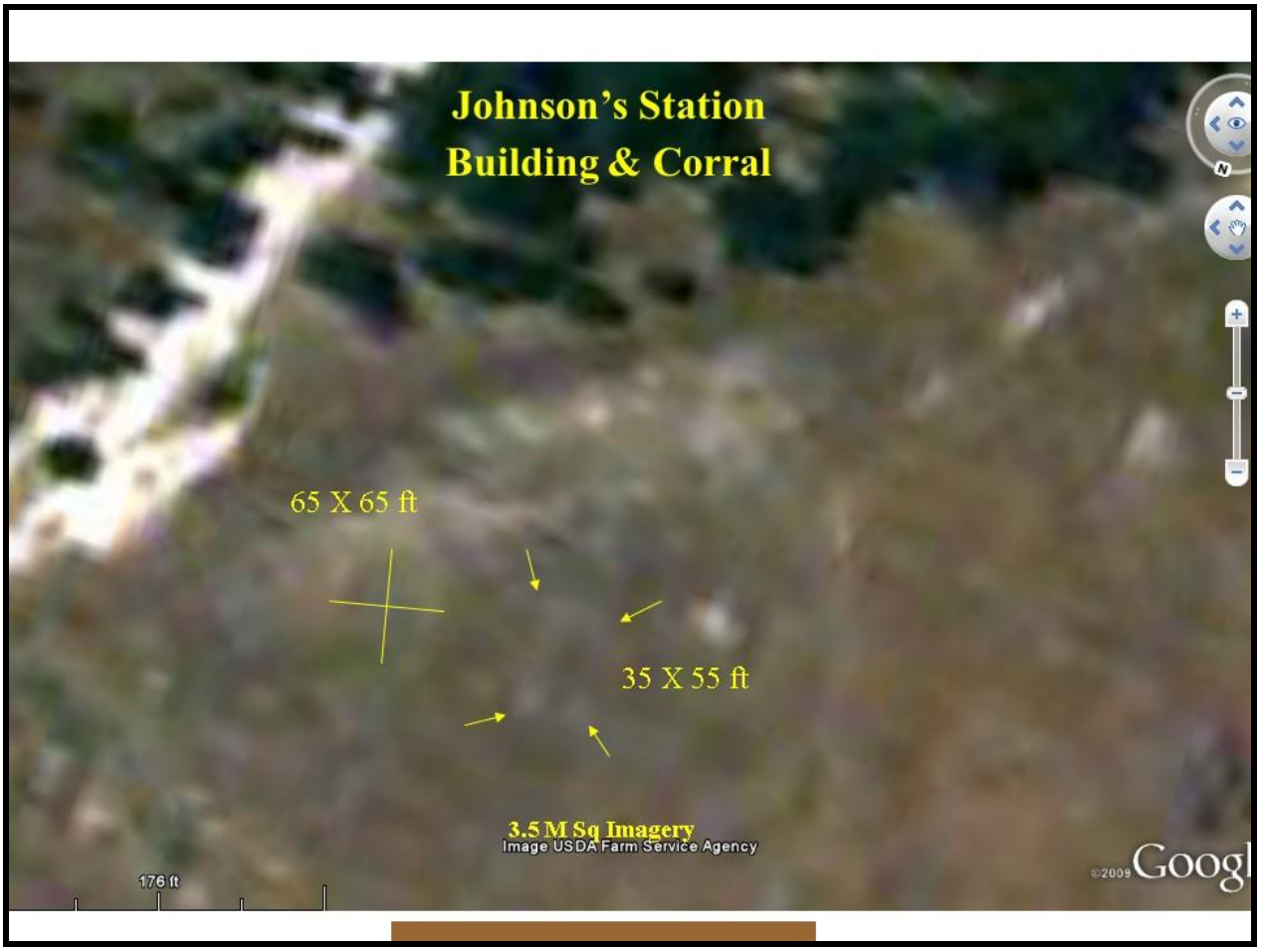
Butterfield Trail and later military shortcut built by Col Grierson (Google Earth)



Two trails passing Johnson's Station (Google Earth)

Location and investigation

A satellite imagery search of the Johnson's Station area revealed earth disturbances, leaving the impression of a building and a corral area. The building measures 35 X 55 feet and is on a north/south axis. The corral measured 65 X 65 feet. The Johnson's Station building was said to be a double log cabin with a 10-foot wide dog trot. One side was used as living quarters and the other as a kitchen area. (Wilbarger) These types of buildings were very common in early Texas. CVAS excavated a building at Fort Chadbourne in 2008 with the same design and nearly the same dimensions. The officer's quarters and the outer foundation boundary measured 51 feet, 8 inches by 33 feet, 4 inches with a 10-foot wide dog trot in the middle. Each side of that building was divided into two rooms. (Riemenschneider)



Johnson's Station building and corral area via satellite imagery (Google Earth)

For the construction of the log cabin, the area was close to a large stand of Pecan trees (referenced in Mr. and Mrs. Evaness's 1857 account) that probably provided the wood for the buildings.

A metal detector search of the area revealed two locations, approximately 325 feet apart, separated by the pecan grove of trees. The southern location revealed square nails, dish whiteware, and cast iron cookware pieces. A military-issued .50-70 military cartridge found at the northern location spurred a more thorough search. Many items were scattered throughout the area, and an artifact mapping regimen ensued. The northern area turned out to be the main area of this site. There were brush piles in the area due to brush clearing by the ranch, so it could not be determined exactly where any particular item was originally. Large footing stones were found near the brush piles that were probably pushed by bulldozers. These stones were large limestone and not natural to the immediate area. They were large enough to be footing stones for a pier and beam log cabin construction.

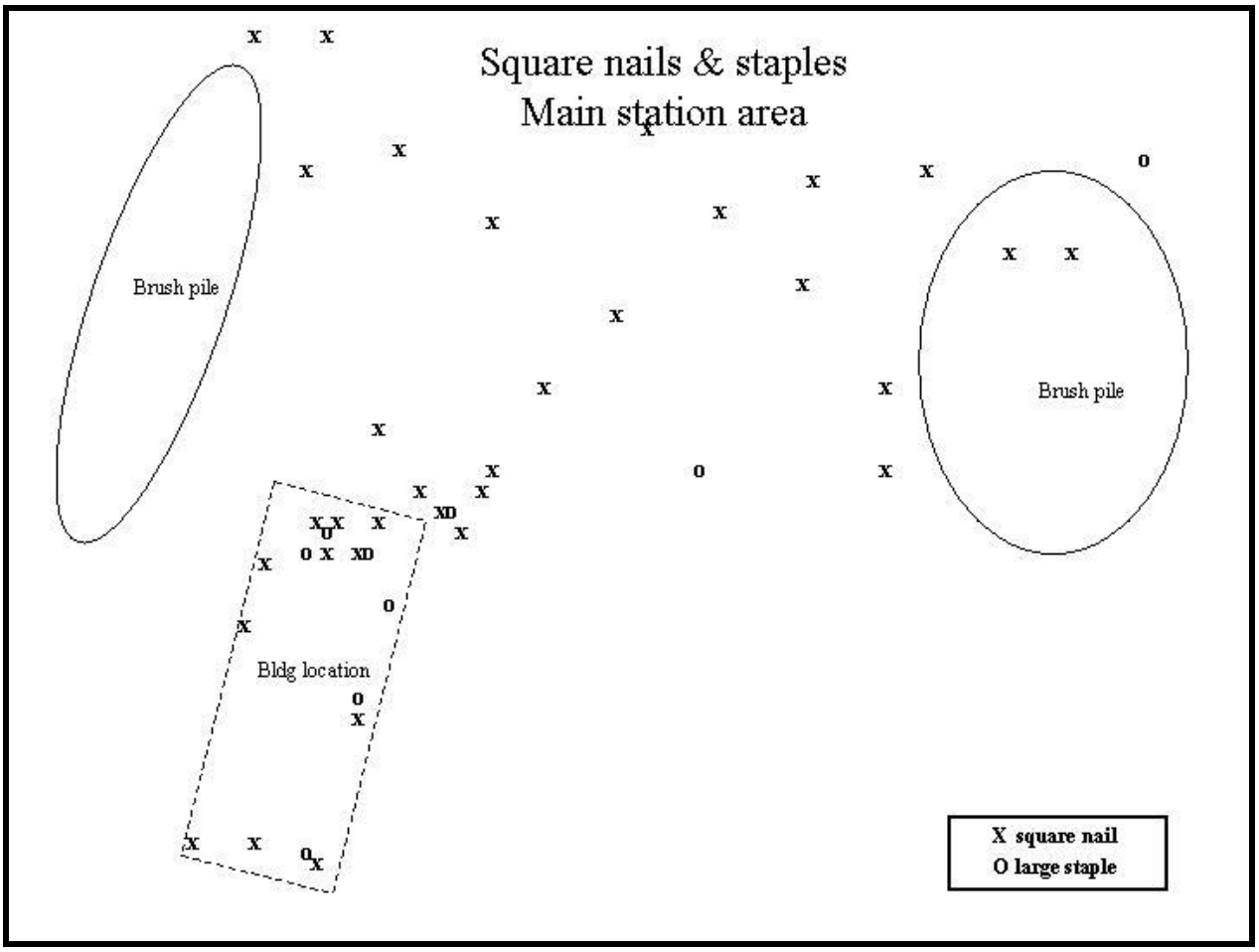
Unearthed limestone was probably used for footings of pier and beam construction

A metal detecting search of the identified area to the south revealed many objects, many of which were within or around the perimeter of the bounded area later identified as a probable building site through imagery interpretation. Artifacts found in the area were either surface finds or averaged 3 – 6 inches in depth. Many objects were building-related (e.g. square nails, large wood staples). Other objects included cooking and eating utensils and military and civilian cartridges.

Some items in the main area were consistent with the civilian and military artifacts of the late 1860s and early 1870s. Many items just could not be tied down to one period or another. It appeared this site covered multiple periods of occupation (Butterfield Overland Mail, 1860s & 70s U.S. Cavalry, 1870s & 80s civilian, and 1890s & early 1900s homesteading). The secondary building, located 225 feet away in the trees, probably had some relationship during one of these periods, but which period could not be determined. The entire area covered approximately five acres and was designated as a single site.

Results of the Johnson's Station Archeological Investigation

Although seemingly less significant, square nails played a major role in determining the location, size, and likely structure of the two buildings at this site. As explained previously, the original site location and at least one of the building structure locations and dimensions were originally determined through satellite imagery interpretation. Although many of the artifacts were moved through previous bulldozing of the area, the number of nails helped support the likelihood these structures were of log construction and the patterns were enough to discern the likely orientation and size of the structures. Nail sizes varied from very small to very large (6 inches) and every size in between. Since it appeared that large staples (usually used for fencing) were also used in these structures, those were also included in the pattern analysis.

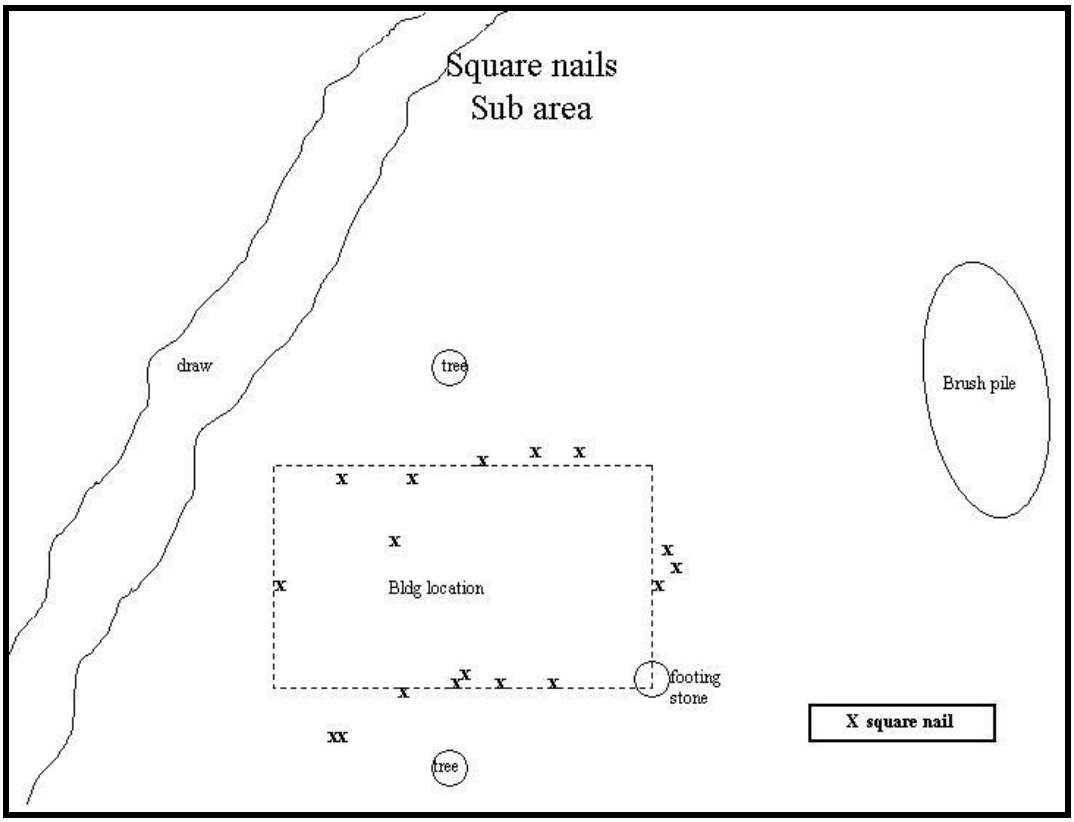


Square nail and staple distribution at main site location

At the main station site, many of the nails appeared to have been randomly distributed by the bulldozing activity. However, the numbers support a probable log cabin structure, and the concentration along or close to the assessed building perimeter supports the building's location, size, and orientation. Six round nails were also found within the site area. These probably came from the occupation during the early homesteading period. Large-scale production of round wire nails began in the U.S. in the 1880s. About 1890 wire (round) nails became more popular than cut nails in the United States. In the Far West, wire nails outnumbered cut nails by about 1900.

At the southern building location, there was also a concentration of square nails. The distribution and orientation support the assessment that this building was of similar construction as the main area – a 35 X 55-foot log cabin. The only discernable evidence of the period is a single shotgun shell found at this site dating to the proper period of military occupation. It's

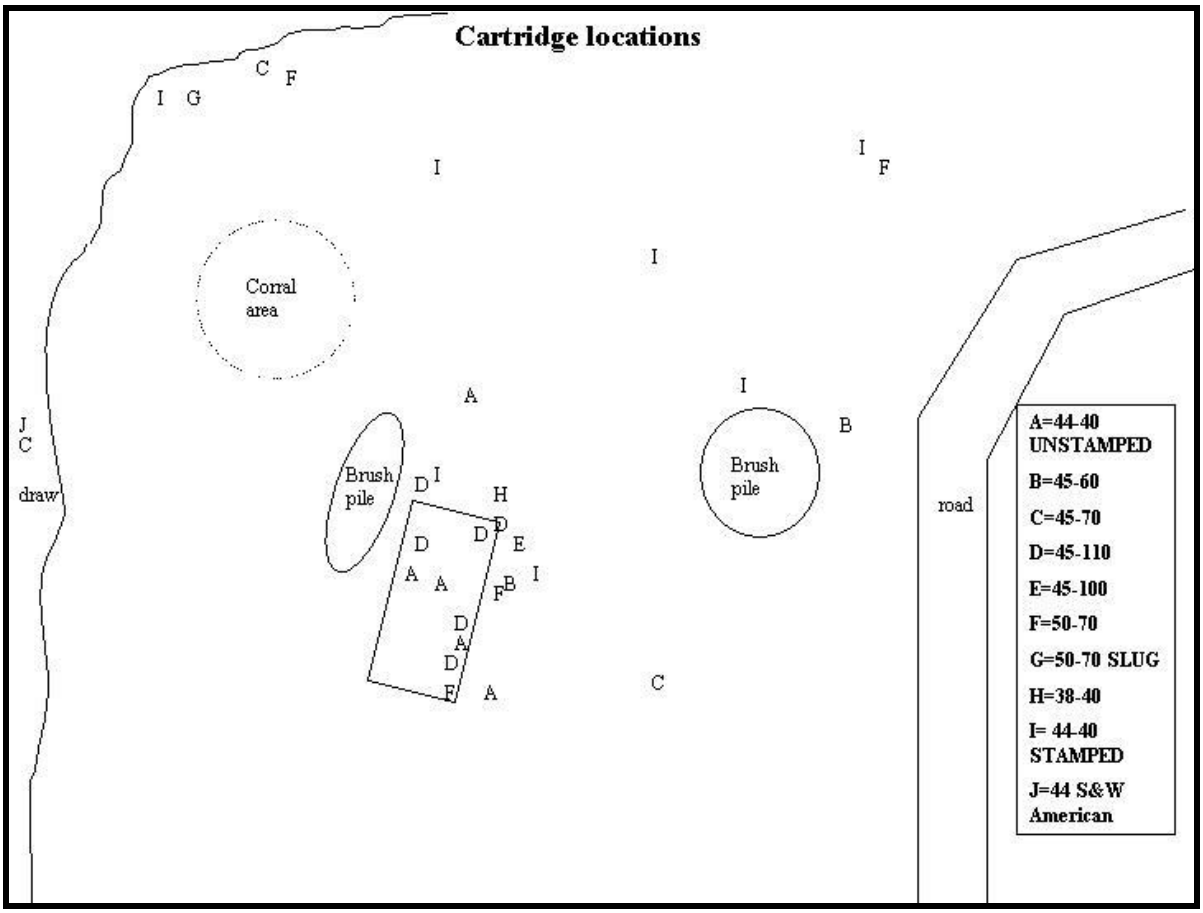
possible the Fort Chadbourne soldiers may have occupied this building during their six-month period of occupation in 1867.



Square nail distribution at building #2 (southern) location

A pattern analysis could be conducted with the numerous cartridges found at the main building. Once again, the pattern correlated to the main building's location, size, and orientation as interpreted through satellite imagery. The most numerous cartridges around the building perimeter were the Sharps 45-110/45-100, unstamped 44-40, and the military 50-70. It is hard to assess what all the firing was being conducted for accurately. It is possible that buffalo/deer hunting was taking place, but it seems unlikely to be taking place from an occupied building, and with such numbers and variety of cartridges. Given the numerous reported encounters with hostile Comanche Indians in the area during the Fort Chadbourne and Fort Concho cavalry period, it is not too big of a leap to theorize that occupants at this location often believed they were defending themselves from hostile bands of Indians. However, cavalry units officially reported none of these encounters from this location. A possibility could be that night guards -

military or civilian - used a 'shoot first, ask questions later' approach when encountering any perceived encroachment on their camp, whether it be actual or imagined.



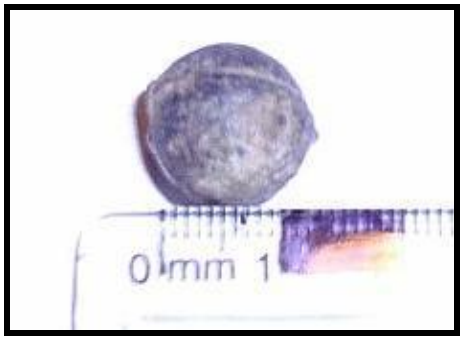
Cartridge distribution at main site location

Although many of the artifacts are general in nature and cannot be directly tied to one period or another, some can be assumed to be from four specific periods of occupation (e.g., Butterfield Overland Mail, U.S. Cavalry, possible buffalo hunter camp, and ranching).

Johnson's Station Butterfield Overland Mail Period

One 54-caliber round ball was found on a rise above the main site area, approximately 350 feet away from the building location. The ball was probably dropped. The seam is very apparent and the cut from the mold. The ball is uneven, measuring from .501 to .540 inches, with the most common measurements being between .520 and .530 inches. The 54-caliber flintlock was a common trade gun for the Indians and this ball could have come from one of the two documented times Comanche Indians attacked the stage station. Additionally, a 4.25 X .5 inch

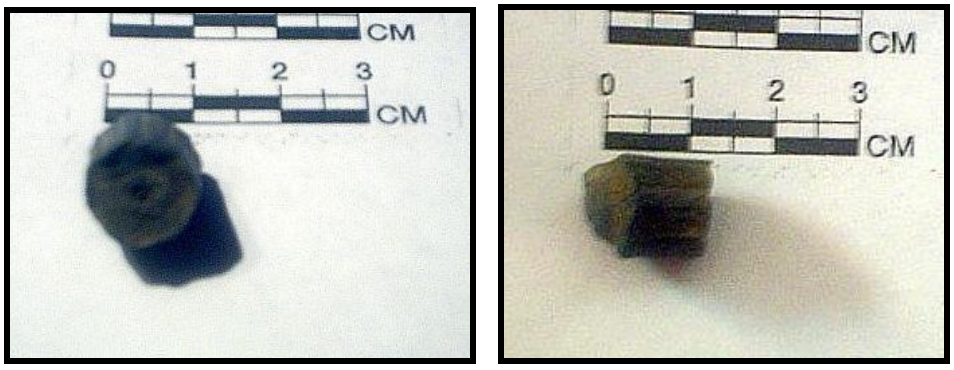
thin strip of lead was found about 240 yards from the station. This was probably to be used for making of lead ball and dropped from a pouch.



.54 caliber round ball

Typical .54 caliber flintlock Indian trade gun (www.apacheria.com)

Another unusual lead bullet from a probable percussion pistol was found on the Butterfield Trail leading up to the station, approximately 550 feet out. It has an unusual hexagonal shape with straight grooves running lengthwise of the bullet. The diameter ranges between .442 and .445 inches.



Hexagonal shaped bullet

The length and weight are almost half of the famous Whitworth hexagonal bullet from the Civil War, so the assumption is it must have come from a pistol rather than a rifle. The only pistol we've been able to research that fits this bullet is a double-barreled percussion boot pistol. This pistol would be of the type possibly carried by persons during the Butterfield Overland Mail stagecoach period.

This double-barreled boot pistol with hexagonal bores is 6.5 inches long and has a 3.5-inch barrel. The hexagon barrel is 3/8 inch, which fits the hexagonal bullet found along the Butterfield Trail.

A very large tin spout canteen dug up in the area of the main site cannot be matched with any known military canteen of the period. The depth was much deeper than any other artifacts excavated, indicating it was discarded much earlier than most of the artifacts. It is an unusual 12 inches in diameter and probably held two quarts of water. It has a tin spout. The tin spout canteen was popular before and throughout the Civil War. The tin spout was soldered onto the canteen and was well-known for failure. Later, the spouts were made of pewter. Although this canteen was constructed of the two pie-shaped pieces soldered together, the spout is offset from the seam rather than soldered on the seam. Due to the size, it was probably carried on wagons rather than by horse. The stage drivers of the Butterfield Overland Mail carried their own personal canteen, and each passenger was allowed one personal canteen to carry. Since they

were passing long distances across very dry country the canteens would have had to be as large as possible. This may have been carried by either the driver or a passenger who failed and was thrown away at the station.

Excavated 12-inch pre-Civil War period canteen

12-inch tin spout canteen

Johnson's Station U.S. Cavalry Period (1867 – 1882)

The .50-70 and the .45-70 cartridges found at this site are one of the most direct connections to the U.S. Army occupying this location. The .50-70 Government cartridge was a black powder round adopted in 1866 for the US Springfield Model 1866 Trapdoor Rifle. The cartridge became the official Government cartridge of the US military until it was replaced by the .45-70 in 1873. Two types of .50-70 cartridges were found. Two cartridges were internally primed Benet cup and likely fired by a Model 1868 or 1870 Springfield or Remington carbine. This is based on the lack of firing pin drag common to the Sharps carbine. One cartridge is a Remington-made Berdan cartridge, externally primed brass with a raised ring. The firing pin markings show this was fired from a different rifle than the Sharps, but identification could not be determined.

.50-70: **internally primed Benet cup Remington Berdan cartridge**

One 50 caliber slug was also found that was mushroomed close to where the first .50-70 cartridge was found.

.50 caliber bullet found not far from .50-70 cartridge

A 10-gauge shotgun shell stamped UMC CO No 10 was uncovered at the site of the second building to the south and in the Pecan grove from the main building. In 1873, UMC acquired the patent rights to the C.D. Leet Company's paper shotshells and began manufacturing primed but unloaded paper shotshells in 10- and 12-gauge loads. During the 1800s, shotguns were a popular weapon employed by cavalry units. Cavalry units on both sides of the American Civil War employed shotguns. American cavalry (military as well as Texas Rangers) went on to use the shotgun extensively during the Indian Wars. Horseback units favored the shotgun for its ease of aiming and devastating close-range firepower.

UMC No 10 shotgun shell

Another cartridge from the U.S. Army period of occupation found here was the .44 Smith and Wesson American. The 44 S&W American was one of the earliest American center-fire revolver cartridges. It was used in the S&W single-action Model 3 revolver. It is known to have been used late in 1870 and was probably introduced as early as 1869. The U.S. Army used this cartridge and revolver until 1873. (Barnes) When it was introduced, many officers and enlisted men preferred the Smith & Wesson No. 3 to the much slower-to-load Colt Model of 1860 .44 cap and ball. While the US Army bought about 2,000 No.3 for issue, the troops also privately purchased large numbers. The Model No. 3 S&W was carried in many engagements against the Indians, long before the Colt was finally issued. According to 1874 ordnance returns, the 4th Cavalry still had a few .44 Smith & Wesson revolvers in use at the time. (Cruse)

Sitting on top of one of the brush piles and next to the stagecoach building site was an M1858 cavalry canteen. A pewter spout for this canteen was located approximately 200 feet away. Two one-inch roller buckles, commonly used on the M1858 canteen leather sling, were also found -

one at each building site location. Finding one of these buckles at the second building location helps support the theory that soldiers may have built this second building during the early 1867 six-month occupation period. The canteen leather straps were on all pre-1862 canteen issues. After that they went to cloth straps.

M1858 canteen and buckles commonly used for leather canteen slings

A military knapsack brad similar to those found at many Civil War and Indian war battle sites was also found.

Knapsack brad adjustment

The lead-soldered side seam No.2 cans like this were common for army provisions. Many of these cans were found on this site and are of the same type found and reported on from the Battle of Red River site and Indian Village 41B1544 in Tule Canyon (Cruse).

Lead-soldered lap side seam No.2 can

A Confederate-made eight-bar curry comb, also of the same type, found at the Battle of Red River site and Indian Village site 41BI544 in Tule Canyon and additionally excavated in Tennessee at a Civil War battle site and displayed in the book 'Confederate Saddles and Horse Equipment,' by Willliam Stone. Each cavalry soldier was required to carry a currycomb like this in his saddlebag. (Cruse).

Confederate-made cavalry eight-bar curry comb

One unstamped .45-70 or .45-55 (the only difference was the number of grains internally) and two stamped cartridges were found at the site. The headstamp on the first one indicates it is a ***C***arbine cartridge made at the ***F***rankford Arsenal in March (***3***rd month) of 18***78***. The second headstamp indicates that it was a ***R***ifle cartridge made by the Union Metallic Cartridge Company of ***B***ridgeport, Conn, in October of 1878. Also, the two fired cartridges were crushed, indicating they were probably military. Crushing cartridges was a common practice to ensure Indians could not reuse the cartridges found on the battlefield. There was concern that Indians were reloading .45-70 and .50-70 cartridge cases that the Army discarded. This was accomplished by inserting a percussion cap in a hole punched in the base of the copper case, filling the case with black powder, and inserting either a newly cast or a reclaimed bullet. The practice of crushing cartridges was officially endorsed by the War Department in General Order 13, Feb 16th, 1876.

.45-70 cartridge




Unfired Benet primed .45-70 **Stamped Berdan primed .45-70**

The three 45-70/55 cartridges were found in areas suggesting outer perimeter guard positions. This theory is supported by a number of tin cans found in close proximity to the cartridge locations. These perimeter positions also suggest the military used this site as a camp.

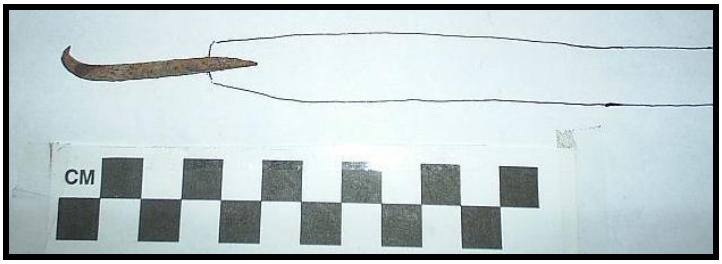
Perimeter guard positions (Google Earth)

Johnson's Station Buffalo Hunter Camp

One .45-100 (also known as 45-2.4"), one either .45-100 or .45-110 (also known as 45-2 7/8"), and five .45-110 cartridges were found at this site. All these cartridges were unstamped. The .45-100 is fired. One .45-110 is fired, and one is unfired. Four look to be unfired reloads with replaced primers. These replaced primers had marks that were probably made by the priming punch used to seat them into place. Possibly related to this, a modified piece of heavy gauge wire that may have been a decapping tool was unearthed nearby. This could have been used to remove the old primers after being drilled.

Sharps 45-110 (left), Sharps 45-100 (middle), two .45-110 one .45-100/110 (right)

.45-110 re-primed cartridge



This was made from a piece of heavy wire and may be a primer decapping tool

The .45-110 Sharps were introduced in 1876, and the .45-100 were added at the end of 1876. At the time, buffalo hunters widely used the .45-100/110. Also, two unstamped .44-60 probable Sharps cartridges with Berdan primers were found at the site – both fired. This cartridge was used in the Sharps Model 1874 and also used for large game and buffalo hunting. The .44-60 Peabody 'Creedmoor' and Winchester rounds were identical apart from designation, but were limited in popularity. The Sharps cartridge was introduced in 1869, Winchester in 1874-75, and Peabody 'Creedmoor' in 1877-78. (Barnes)

Buffalo hunters probably used this unoccupied site as a base camp for a period of time in the 1876 and 1877 timeframe. The buffalo had been visiting the area in the fall each year for many years as they escaped the bitter winters to the north. Captain R.G. Carter of the 4th U.S. Cavalry recalled in 1876 countless herds of buffalo in the area between Twin Mountains and the fort, not far from this location. (Hurt) An immense slaughter of buffalo occurred around San Angelo between 1874 and the winter of 1877 when a particularly hard winter forced the bison from the area. (Nickels) A survey party scouting the route through the area for the Texas Western Railway in 1876 reported as many as 30,000 in the area. The herd was so large it took the two men over an hour to ride through the herd. The outfit of Bishop and Sullivan was known to operate a buffalo-hunting outfit along the Middle Concho in 1876. William Kelly financed another outfit known to work the area. His six-man team reportedly killed a thousand buffalo during the 1876 season. (Tom Green)

Johnson's Station Ranching Period

A few of the items found pointed directly to a period of occupation much later than the Butterfield, military, or buffalo hunter encampment period. For example barbed wire of two kinds were found. One was common to the late 1800s/early 1900s but not unique enough to make a true period interpretation. The second was identifiable as the Scutt Arrow Plate. It is a variation of a patent called the Scutt Single H Plate patented in 1878.

Scutt Arrow Plate barbed wire

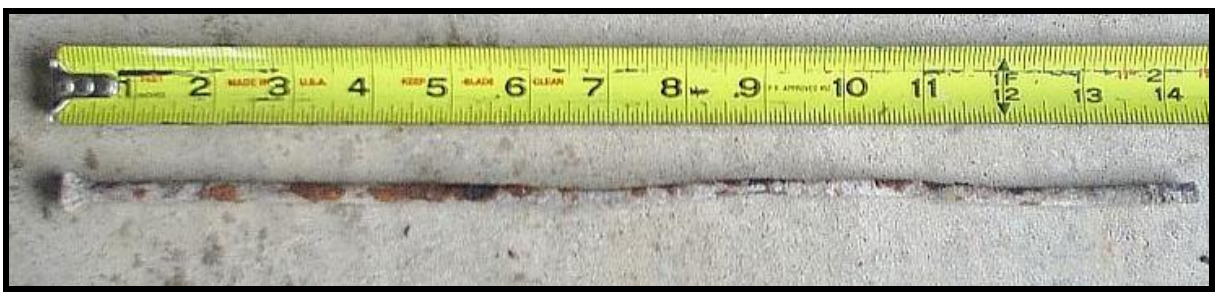
A suspenders clip stamped ‘Paris’ came from the ranching period. Paris suspenders were made by the A. Stein & Company, which was established in 1887 and incorporated in Illinois in February 1909. The company manufactured garters, suspenders, rubber sundries, and other products of elastic webbing under the trade names "Paris," "Ivory," and "Hickory."

A 12-gauge shotgun shell, marked REM-UMC NITRO CLUB 12 comes from the post 1911 period. Another 12-gauge Winchester shotgun shell, marked LEADER comes from a period of 1894 to 1936.

Four Winchester .44 caliber cartridges stamped 44 wcf, w.r.a.co were found scattered. This cartridge was first offered by the Winchester Company beginning 1886. Hunting or protecting sheep from predators might have been behind these particular cartridges in this area during the early ranching period.

Window glass was found throughout the area in close proximity to building location. Window glass would most likely be put in for a permanent occupant in the late 1800s or early 1900s.

Experts at Texas Wagon Works (Gonzalez, TX), Witmer Coach Shop (New Holland, PA) and Bar E Ranch Wagon Restoration (Clinton, AK) all identified this 14-inch threaded bolt found at this site as a bolt for a box buggy/buckboard. Four of these bolts held the passenger seat board to the body of the buggy box by extending vertically thru the seat board and continuing thru the floor frame of the box body. The length of the bolt plus the height of the seat cushion would give the total height of the seat to allow the passenger leg room for their legs to be down in the sitting position.



14-inch threaded bolt for box buggy seat

Box buggy that would use a 14-inch threated seat bolt (tucsonrodeoparade.org)

This piece is broken at the top where it begins to curve to what looks to have been a 90-degree angle. It has the capital letter B embossed on it. This appears to be a wall mounted bottle opener from the turn of the century. It fits the cap of a bottle perfectly. After the first effective bottle cap was patented in the 1894, people began designing devices to get them open, including the wall-mounted variety.

Probable broken wall-mounted bottle opener

The B probably stands for the Betz Brewing Company, established in 1868 and went out of business in the 1930s. Note similarity in the style of the B.

Betz Beer Company beer cap with same 'B' logo (www.trayman.net)

Non-specific Period Artifacts

Artifacts that could have come from any one of the periods but could not be absolutely tied to one or the other were listed in a general category below with thoughts and comments. Many of the artifacts found at this site were very similar to those found and reported in the 'Archeological Investigations Fort Chadbourne (41CK129) Butterfield Overland Stage Station Coke County, Texas' (Riemenschneider).

Cartridges

Eleven unstamped .44-40 cartridges were found at the site. All have been fired, and they appear to come from three different rifles based on the firing pin strikes. The .44-40 Winchester was introduced in 1873. From 1873 to 1885, the cartridges did not have an identifying headstamp. It was the first center-fire cartridge offered by Winchester and was brought out as the standard chambering for the new Winchester Model 1873 rifle. It was also interchangeable with the Colt Army revolver, but this didn't come until 1888.

These cartridges could have come from personal rifles of various cattle drives or trade/freight outfits passing through the area and using the opportunity of a roof over their head. This location was about a day's ride from Fort Concho at a slow pace and was a good stopping point. The 44-40 were scattered much more than the other cartridges found in the area. This could have come from bulldozing the area. There's no way to be sure why these particular cartridges were more

scattered than the rest. It seems unlikely they were used for hunting. Target practice is possible, but there may also have been a defensive action against Indian raiding parties. Indian problems were still showing up in Fort Concho scouting reports well into 1879.

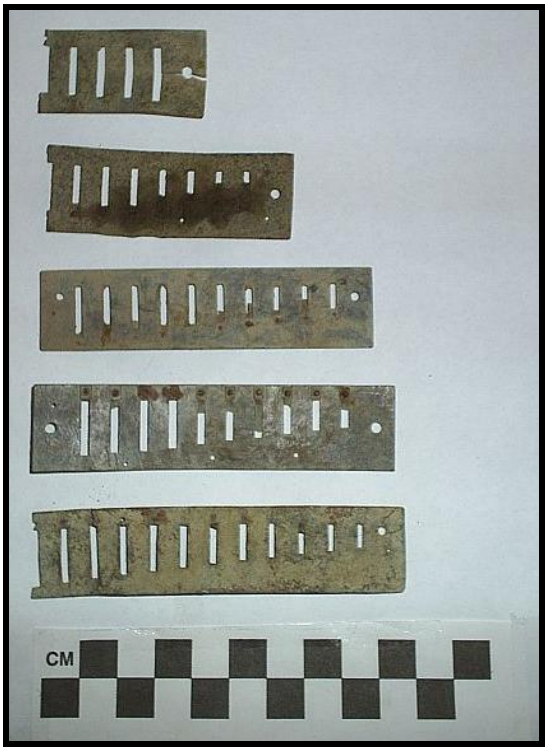
Household goods and hardware artifacts

Various latches & latch bolt (stamped 117LG)

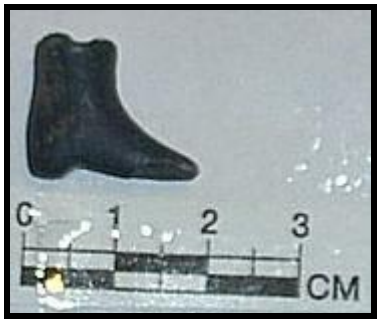
top 2 rows: washtub pieces, third row: possible canteen screw cap, tin can screw cap
bottom row: door hinge pin

12-inch and 6-inch supply can lids

Recreational artifacts



harmonica reeds



bisque (porcelain) doll foot

Food and beverage preparation and serving

spoons, salt shaker top

various pieces cast iron ware

kitchen items (left to right)

top: stove top lid lifter, piece cast iron tortilla skillet

middle: dutch oven handle, pot handle

bottom: grinding wheel (coffee), lid top hinge thumb lever

various pieces crockery

various pieces whiteware

various pieces bottles

various pieces white-ware

various unidentified pieces

probable oil lamp glass

Green wine bottle pieces **for comparison - green wine bottle dated mid to late 1800s at auction** (www.greybirdrelics.com)

Cooking items (top to bottom: ladel strainer, cooking spoon, ladel, cooking item handle)

Possible broken cast iron skillet handle with raised number 7

Workshop artifacts

Two seven-inch axe heads were excavated, one near the main building and the other approximately 100 feet away. These could have been used during any of the occupation periods, but they are easily large enough to have been used to cut down the pecan trees for building the log cabins and posts and rails for the corral area.

7-inch axe heads

Transportation artifacts

saddle ring & broken singletree piece

horseshoes

wagon plate, possible heavy seat back iron

A martingale found at this site appears to be civilian, similar to the Texas martingales found along other cattle drive routes throughout Texas. However, this one lacks the star in the middle and has more elaborate flourishes. A martingale is a breastplate on horse tack used to control horse head carriage.

Martingale (civilian)

Construction artifacts

Construction tools (top row: lag, metal strap with rivet
middle row: nut, chuck for brace & bit, broken hand axe
bottom row: lag, bolt [squared on top])

Assorted nails, staple
(left) square nails (right) round/wire nails

Summary Of Findings For Johnson's Station

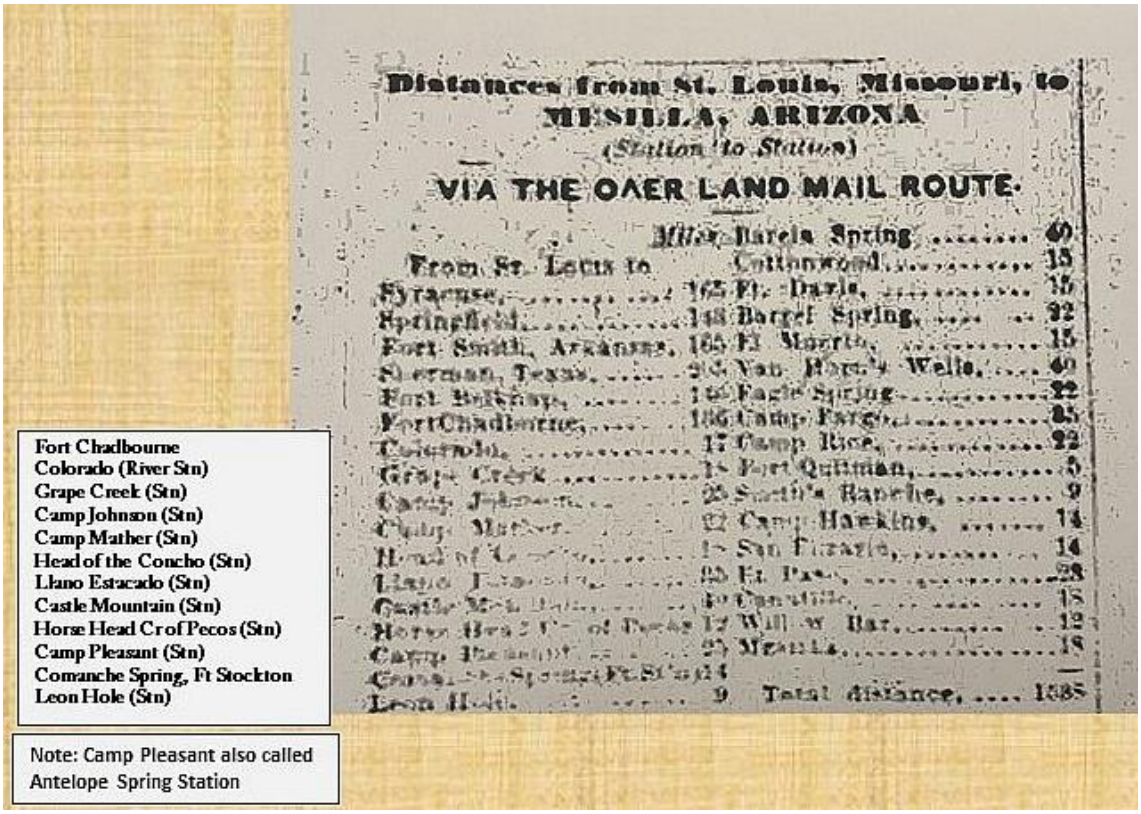
There were many inaccuracies in historical documentation that this investigation cleared up. In addition to the location, it is important to delineate the difference between the first and second Johnson's Station and their general purposes. The first Johnson's Station was the only station used by the Butterfield Overland Mail, and the second Johnson's Station was the only station

used by the Ben Ficklin/San Antonio To El Paso mail and stage line. Although occupation for the original Johnson's Station was not constant, it was a popular location for various occupants from 1857 until after the turn of the century. There are several fairly obvious reasons for this. First, it was approximately one day's ride from Fort Concho and San Angelo at a slow pace. Second, it was near water, wood, and good grazing. Third, it had a log cabin that could be used to get out of the weather and provided a certain amount of protection against Indian raiding parties.

The second building on the other side of the Pecan grove is difficult to determine exactly when and who built it. However, a process of elimination can help make an assessment. Items at that main building site, such as barbed wire, late-period cartridges, and clothing items from the late 1890s and early 1900s, suggest it was also used during the beginning of the ranching period, but this is not the case at the second building location. This second building could have been originally occupied by the stagehands assisting the station master and his wife during the Butterfield period. It could have been built and used during the 6 months of continuous occupation by the companies from Fort Chadbourne in 1867. If the site needed to house up to 40 troops for six months, they may have decided that a second building was worth the effort. Unfortunately, most of this building and its contents were probably washed away during major floods in 1882 and 1936.

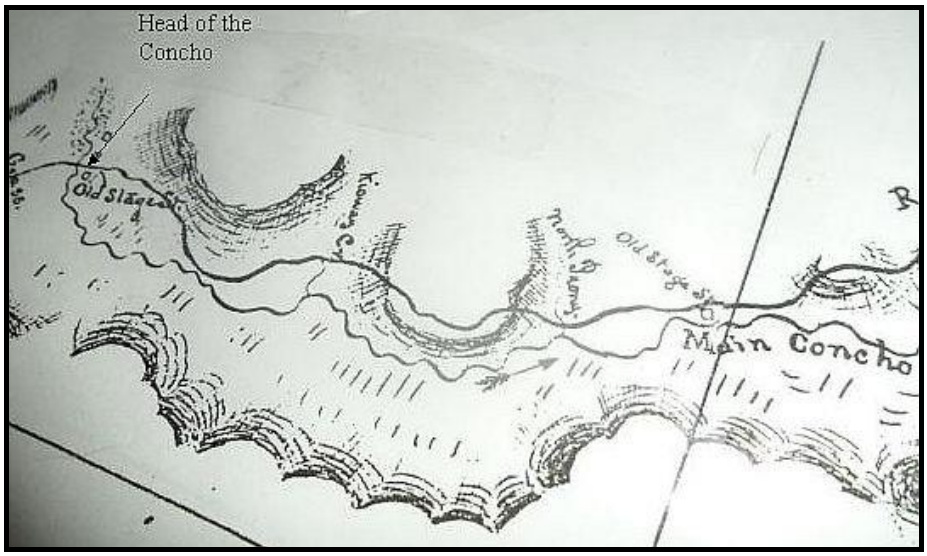
7. Camp Mather Station

The parcel of land for the new station was surveyed in 1860, and the title was issued on February 27th. The station was named Camp Mather (Station), the surname of the line agent in charge of the station. (Ely) Camp Mather Station was a swing station, probably with just enough time to change out a mule team and continue. There are no comments about this station in the various traveler's journals. However, the existence of this station was recorded on the last published timetable for the Overland Mail in 1861.



Messila, Arizona Overland Route with Camp Pleasant

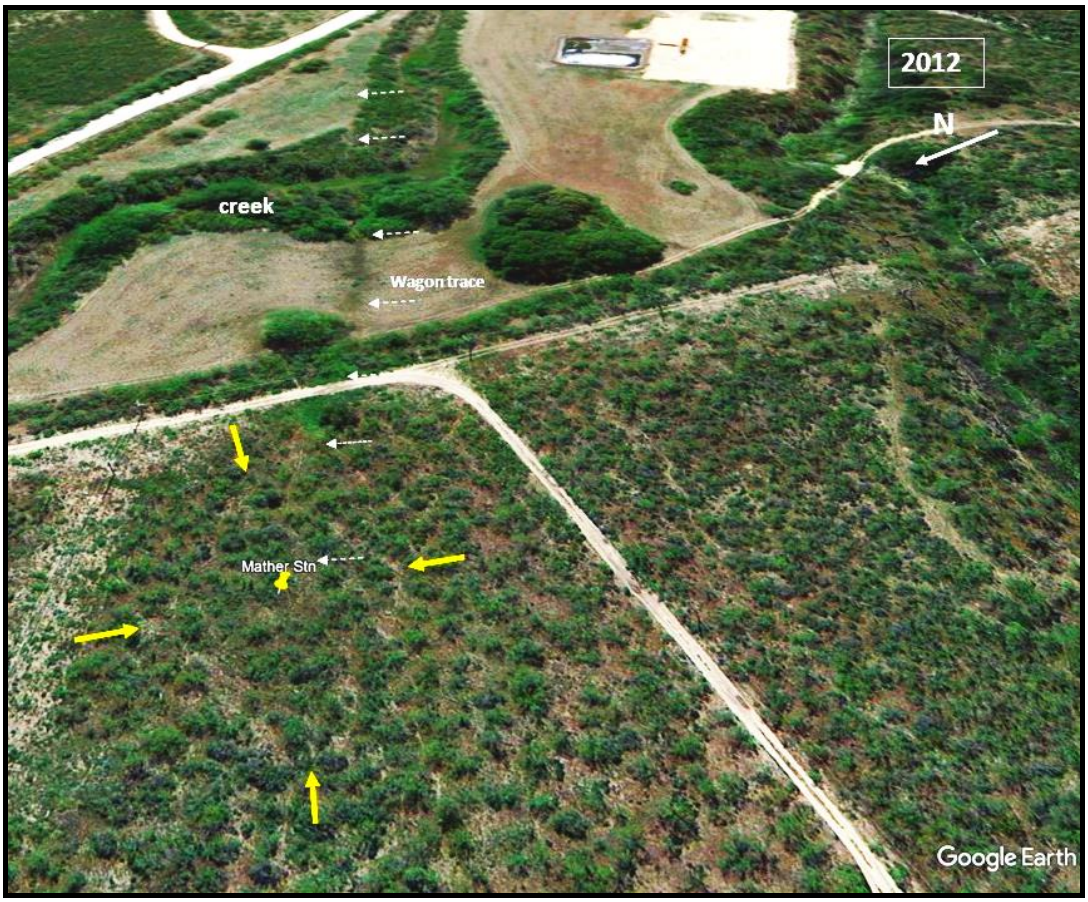
The location in question is again answered through a military map created by a cartographer with Brevet Lieutenant Colonel E.J. Strang during his expedition from Fort Stockton to Fort Chadbourne in October and November 1867. The map shows the abandoned stations along his route, and the distances are very precise.



Close-up of the map with the Head of the Concho and Mather Station

By measuring the distances on the map, the station's location was determined and analyzed on Google Earth. The imagery revealed the abandoned station site precisely where the cartographer placed it.

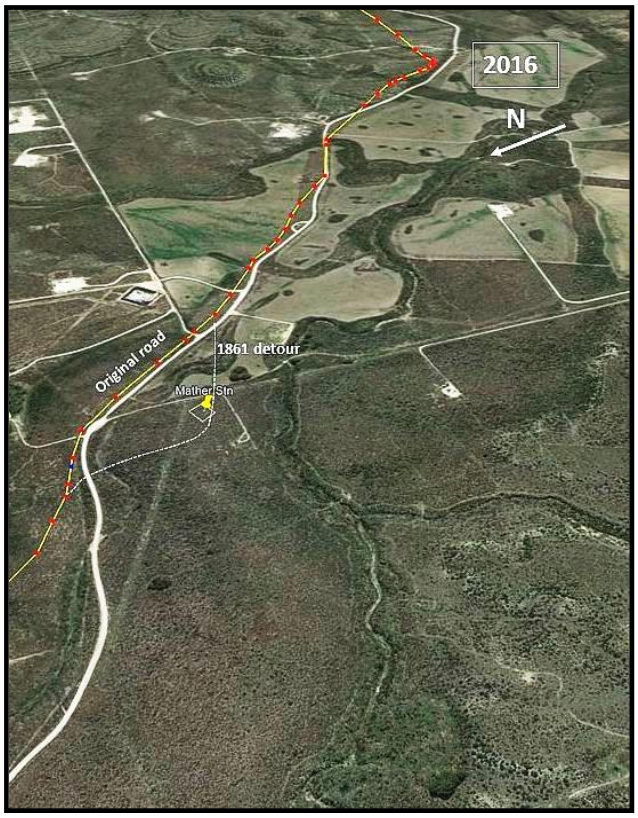
The abandoned station compound left an impression in the vegetation. That, along with the wagon trace leading into and back out of the station compound, shows this to be the correct site. The terms ‘compound’ and ‘station’ are used interchangeably here.



Vegetation Impression of Station Compound and Wagon Trace

All stations in West Texas required a defensive compound due to attacks from Indians. Stealing mules and horses was the main threat. Still, the stations and stagecoaches were also considered to be unwelcome interlopers by the Comanche nation, and lives were also constantly under threat. High walls to contain both animals and people were required. The large pecan trees were the building material along the Middle Concho River, and compound walls were probably high, straight logs of picket style. Pecan was used up the road from Mather Station at the Grape Creek and Johnson’s Stations. (Ashmore, Grape Creek Station, Johnson’s Station)

Example of Picket Wall Compound



The remnants of the compound, along with everything else in it, were washed away long ago in the massive floods of the late 1800s and early 1900s. However, vegetation grows back in lines and angles from where these walls were built. That vegetation gives us a remnant image of the compound when we look at it from high above.

Wagon Trail Trace Runs Through Compound at an Angle

The original wagon road passes by this site area, but the new road detours from its previous route to this new stage station compound. Besides being generally halfway between the other stations, this site was probably picked because of a creek running past it and down to the river. This creek was likely spring-fed, making this location highly desirable.

The new wagon road runs through the creek on the east side and crosses the creek again on the northwest side, intersecting back into the main road.

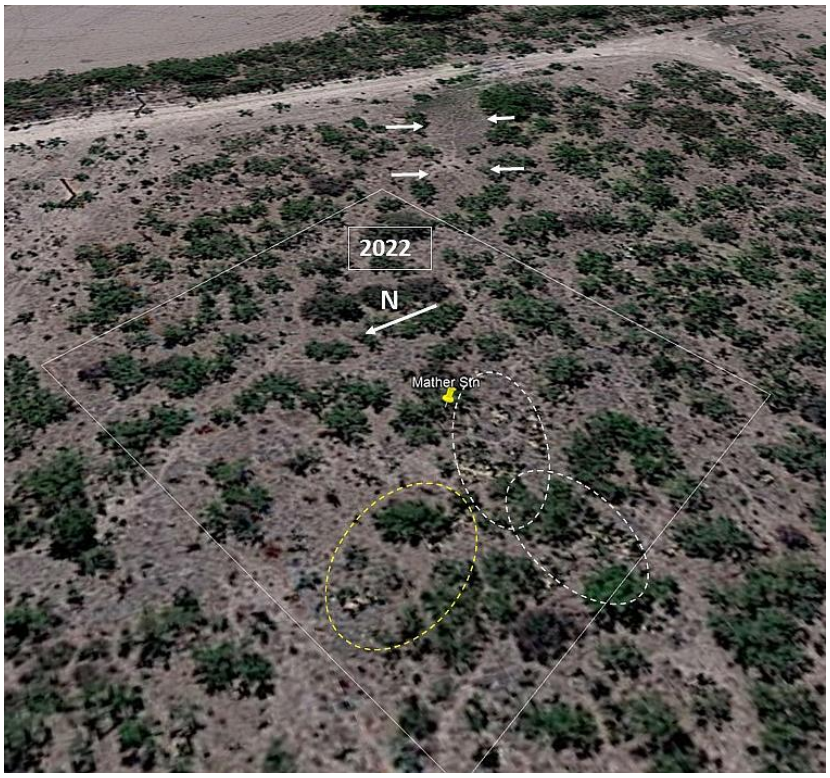
This station compound wagon entrance and exit is unique. It runs through the compound at an angle. Most station compounds had the wagons run straight in a single door, turn around inside the compound, and exit out the same door. Here, it enters a door on the south side and exits through a second door on the adjacent wall of the northwest side. This must be because the road had to continue in the direction of the northwest side wall.

Wagon Trace Crossing Creek on the West and North Sides

The compound measures 150 X 130 feet, making it large enough to maintain the animals inside. One image from 2022 may hint at where the animals were being kept within the compound. Our work on the 1869 – 1882 Concho Mail Station, near San Angelo, Texas, indicated that prickly pear growth within an abandoned compound area tends to reveal where animal dung bioturbation previously took place. (Ashmore, Concho Mail Station) The prickly pear tended to grow more heavily in areas we know were corral and tending areas, even after 140 – 150 years.

In the case of Mather Station, we can see in the 2022 imagery that prickly pear was growing heavily in the area, which was likely the team hitching and unhitching area within the compound.

However, an additional area (highlighted in yellow) shows growth north of the wagon trace hitching area. This likely was the corral area.



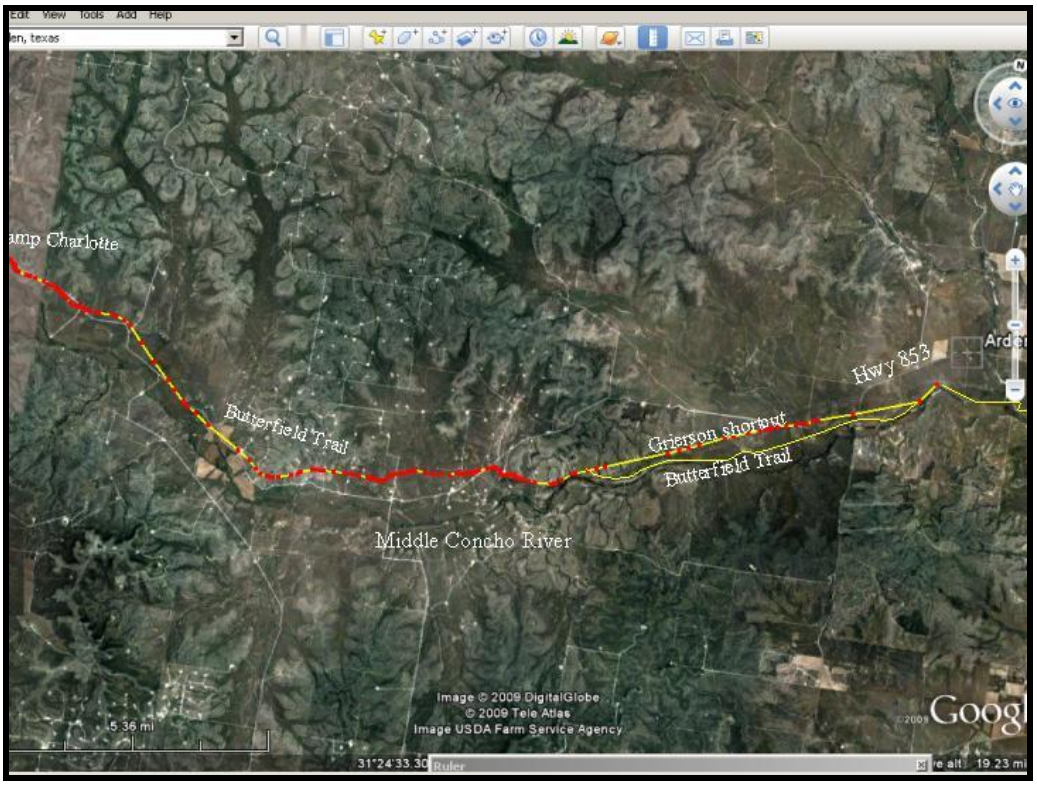
Prickly Pear Growth: Wagon Hitching Area (white), Possible Corral Area (Yellow), wagon swale (arrows)

The wagon swale can still be seen from above and on the ground. The swale is approximately 15 feet across and 12 – 24 inches deep, and 10 feet wide as it approaches the compound from the east (highlighted in green). This matches the width and depth of the wagon swale under similar soil conditions at Grape Creek Station.

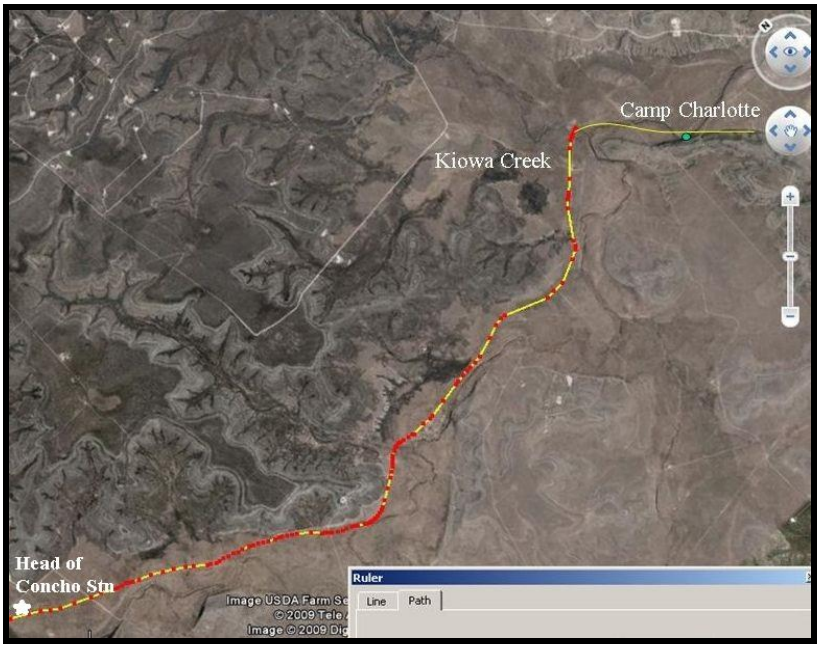
Wagon Swale

8. Head Of The Concho Station

In a 1996 field project, the Texas Archeological Research Laboratory and Concho Valley Archeological Society thoroughly recorded and reported on the Head of the Concho Station.

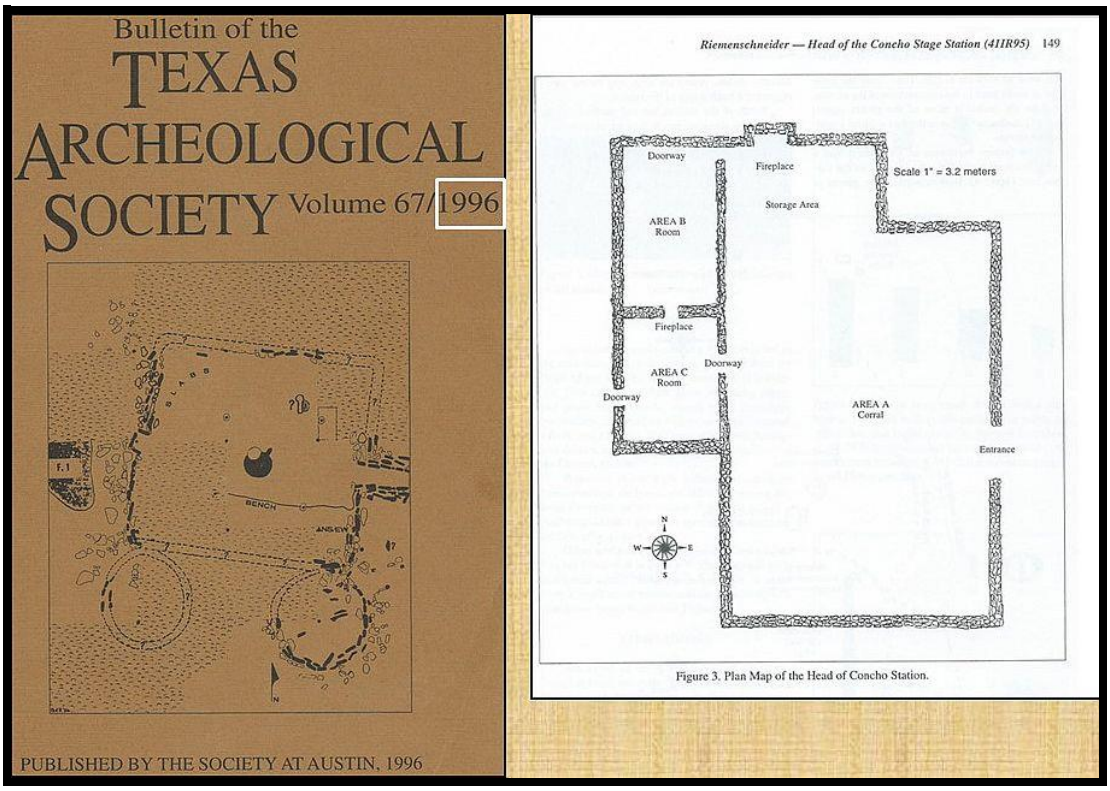


Butterfield Trail continues from Johnson's Station past later location of Camp Charlotte



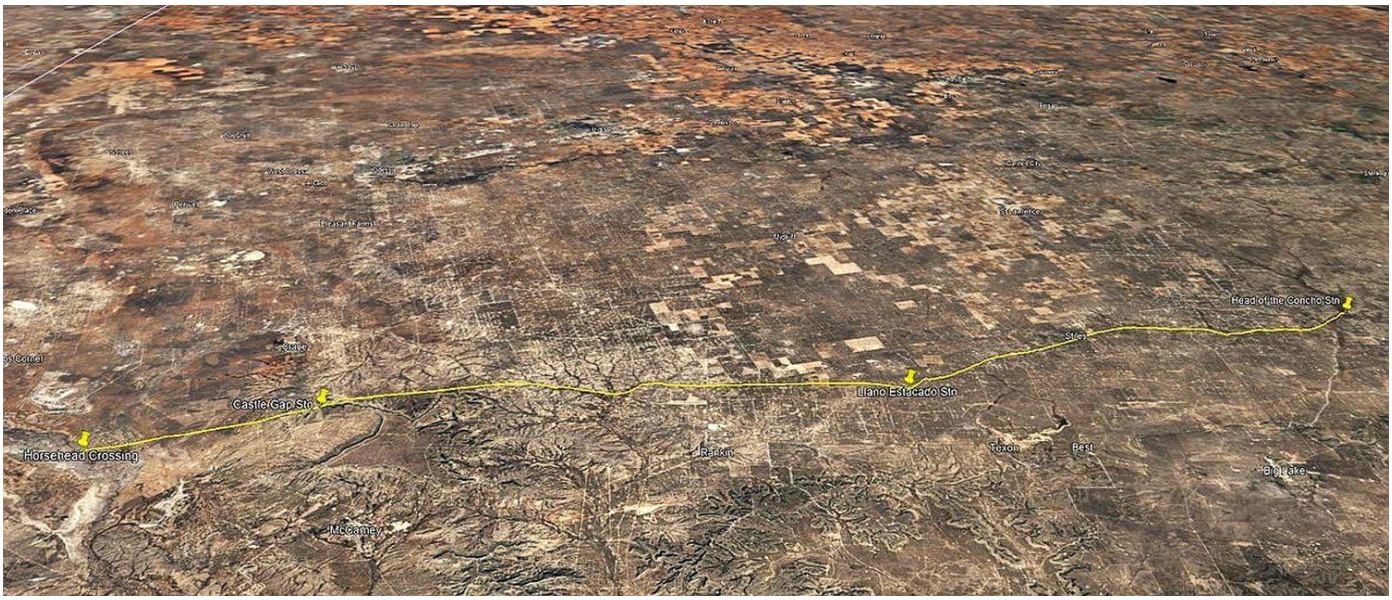
Butterfield Trail from Kiowa Creek to Head of the Concho Mail Station (Google Earth)

Head Of Concho Station



Head Of Concho Station Report (Riemenschneider)

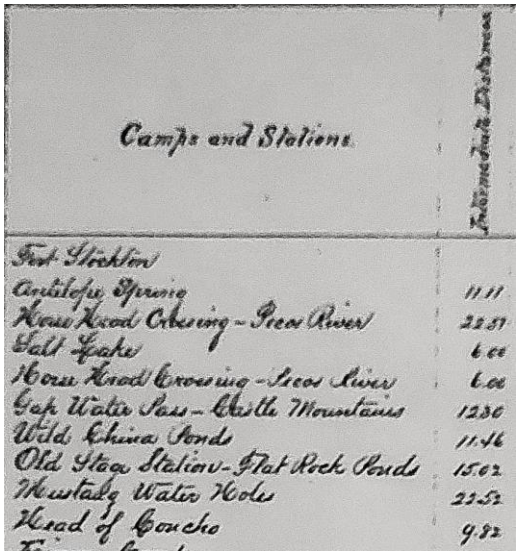
From Head of the Concho Mail Station, the trail continued west, crossing 66 miles of arid plains and draws to Castle Gap. Only seasonal water holes could be found over this dry land. Most of the time, though, they were dry.



Entire trail section between Head of Concho and Horsehead Crossing (Google Earth)

9. Llano Estacado Station

The Llano Estacado Station was constructed approximately half way between the Head Of The Concho Station and Castle Gap. According to the 1867 military map, it was placed at a location named Flat Rock Ponds. However, Flat Rock Ponds were seasonal at best for water. The Butterfield Company had to contract for water to be hauled by wagon from Mustang Water Holes, seven and a half miles east. (Ely)



Military map of crossing west to east on 1867 expedition

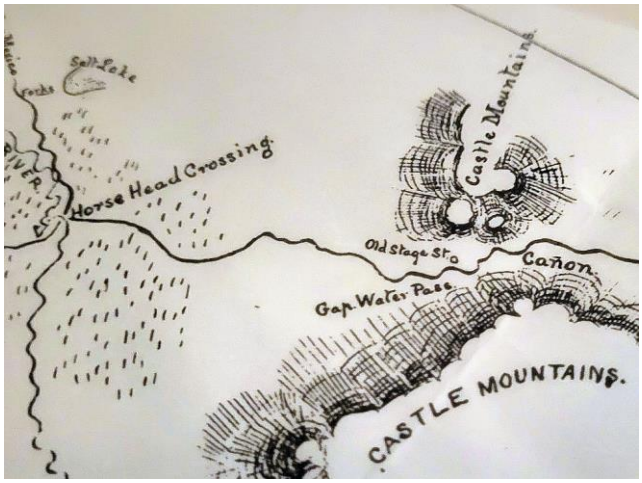
Vegetation impression of Llano Estacado Station remnant and Butterfield Road

10. Castle Gap Station

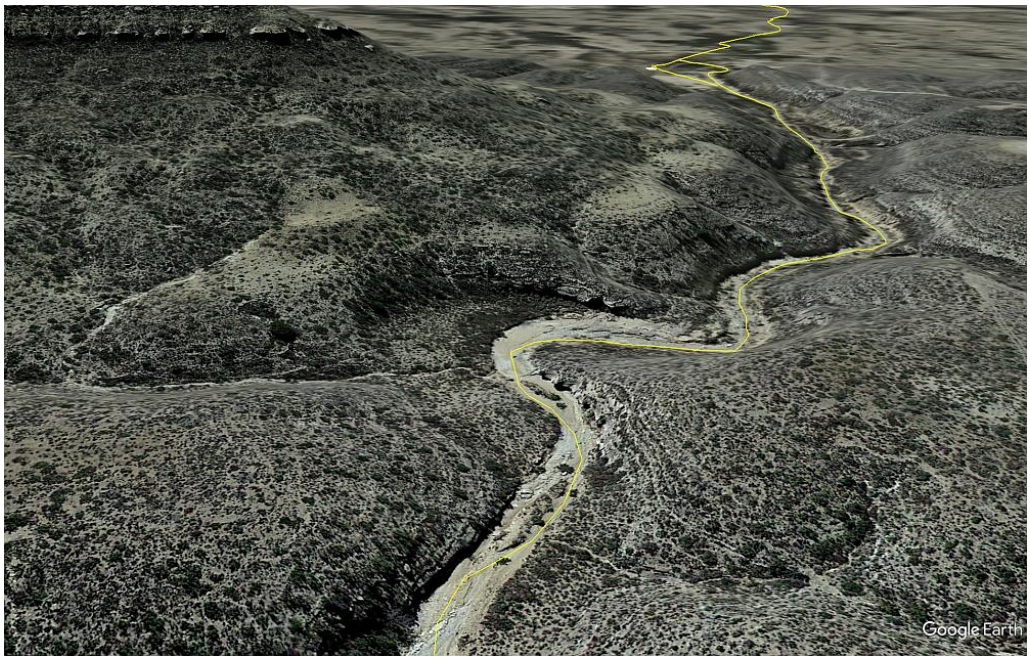
Castle Gap Station was added to the route in 1859, one year after the road's opening. After crossing 66 miles of arid plains, Castle Gap (also called Castle Mountain at the time) greeted westbound travelers as a narrow gap in a 40-mile-long wall of mesas.

Castle Gap (photo courtesy Donnie Henderson, https://www.txgenwebcounties.org)

The company found that continuing another 12 miles to the Horsehead Crossing Station pushed the mules beyond their endurance, especially without water. They found a small seep spring with brackish water in the area, which prompted the company to build this tiny station. (Ely) The station is annotated on the 1867 military map. It was small in comparison to most station compounds. It measures only 50 X 30 feet. It was constructed of local limestone. This was too small for a stagecoach to drive inside the compound. It was only enough to maintain a watering stop for the mules before continuing, and possibly a few mules to change if some were broke down from the long run across the open prairie.



1867 Military Map with abandoned Castle Gap Station annotated



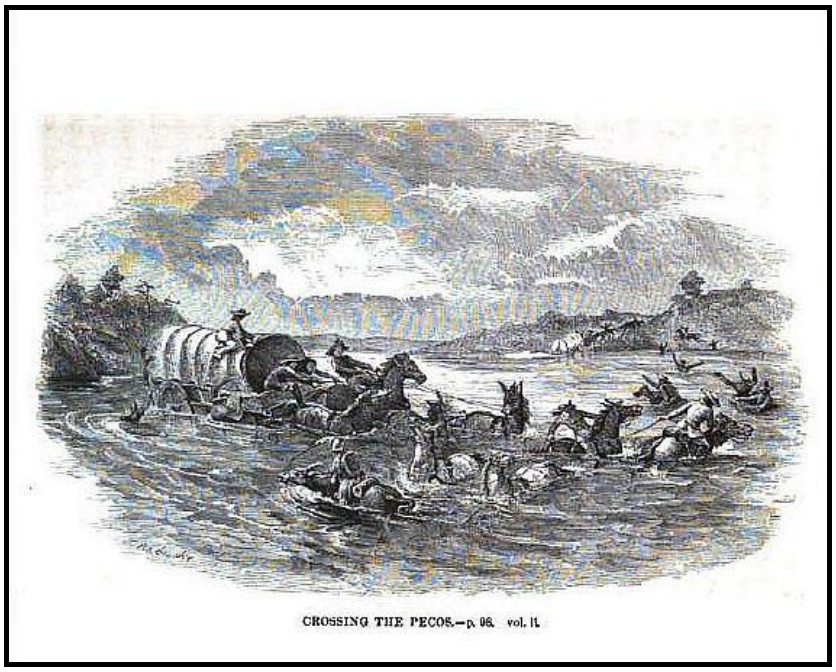
Route Through Castle Cap (heading west)

Overhead Compound Impression of Castle Gap Station Remnant

11. The Pecos River Horsehead Crossing

"Oct 30th, 1850: ***After breakfast, I examined the river with a view of crossing, intending to devote the day to it, and recruit our tired animals. Found the water at Horse-head Crossing, which was a quarter of a mile from our encampment, to afford the greatest facilities. Here there was a bank about half the height of the main bank, to which there was an easy descent, and one equally to the water. It is the place where other parties seem to have crossed, and hence rendered easy of access. I noticed long line of horse or mule skulls placed along the bank, which probably gave it the name it bears."*** **John Russell Bartlett**

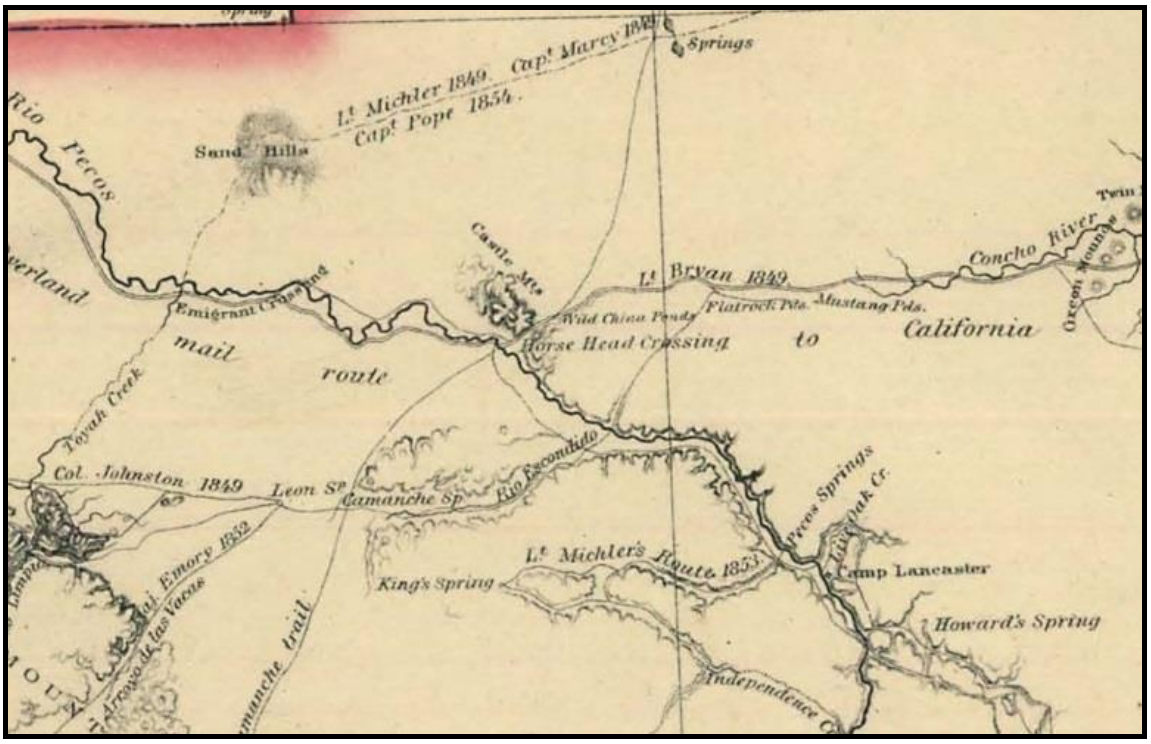
Bartlett goes on to describe a harrowing experience trying to cross the swift waters and keeping their wagons and mules from being swept away. They had to enter the waters and cross diagonally to the opposite bank to cross. At one point, the mules lost their footing and panicked. They were saved from being swept downriver by a young soldier who swam to the mules with a long picket line. The men could then pull the mules from the opposite bank back to an area where they regained their footing.



Drawing from Bartlett's account of 1850 crossing the Pecos River at Horsehead Crossing (Bartlett)

Same crossing point of Bartlett's account

Horsehead Crossing on the Pecos River is well known to most folks in West Texas. It was the main crossing for the Jumano Indians on their trading excursions from the Concho River area, the Comanche on their raids into Mexico, the early emigrants on their way to California, the Butterfield Overland Mail, and numerous freighters and cattle drives on their way to and from New Mexico. Horsehead Crossing was one of the few fordable points on the Pecos River in the early days of this wild and open territory. The Pecos River's steep, muddy banks, unpredictable currents, and quicksand were dangerous in most other locations for many miles in each direction. After long treks across the surrounding desert, thirsty animals would either drink themselves to death or become hopelessly mired in the mud at the crossing. This was especially true for the Comanche raids returning from Mexico, where horses were the main commodity of the raids. This is where the name of Horsehead Crossing came from. So many of the horses died that when the emigrants and others making the trek arrived at the crossing, they began hanging the horse skulls on the bushes.

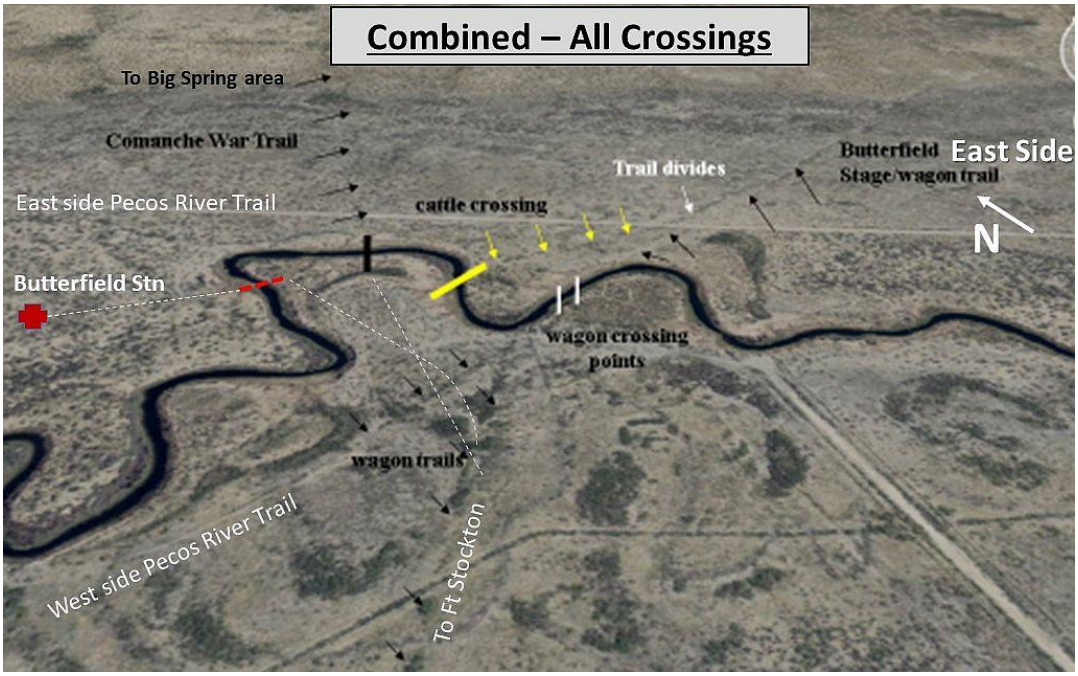


1859 Military Map of Texas with Horsehead Crossing

When Charles Goodnight and Oliver Loving made their first cattle drive to New Mexico in 1866, they weren't quite sure what they were getting into. After 72 hours non-stop with no water, they

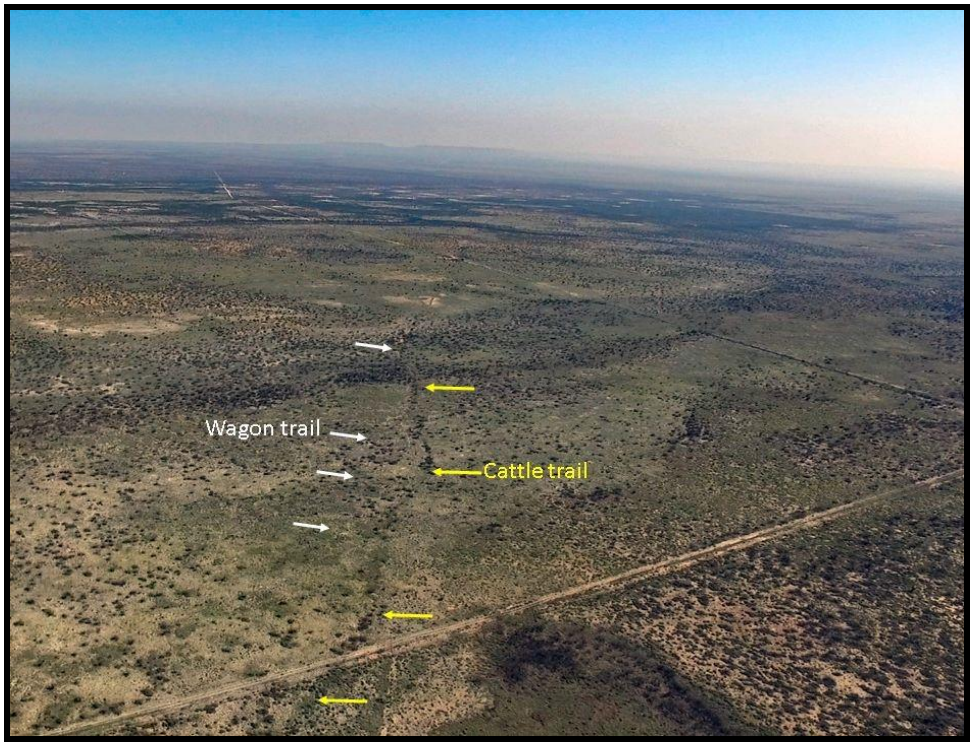
passed through Castle Gap, just 13 miles from the Pecos River. The cattle became crazed for water, and when they passed through the gap, they could smell the water and burst into a run. They ran so hard that the ones behind the leaders pushed them right across the river so they could not even stop to drink. After the herd crossed the river, Goodnight turned them back to the water to get their fill. After a few days of rest, they started what remained of the herd up the east side of the Pecos River, which was the continuation of the Butterfield Trail, heading northwest toward the southeastern boundary of New Mexico. Their herd of 2,000 was now down to about 1,500. Hundreds were lost on the three-day waterless trek, and hundreds more died in quicksand along the river. However, they still made quite a bit of profit from that drive, and with that news began the many cattle drives across West Texas and on to New Mexico and Colorado.

In the satellite imagery of the trail leading up to and across the river, I found there was not just a single crossing point, but there are three distinct trails that can be seen in the Google Earth imagery, and they cross at slightly different locations. It takes a lot to develop a trail that can still be seen in satellite imagery 160 years later, so this was not by happenstance. Other than the main and well-known wagon crossing, I could see a second trail breaking off from paralleling the wagon trail coming from the east and heading to a different section of the river to cross. This trail is not as distinct as the wagon trail and looks much like the cattle trail that parallels the main wagon trail heading into Castle Gap. It appears the later cattle drives were directed to this section, probably to keep them from destroying the wagon crossing location. It also leads right into a perfect bend in the river that could be used as a natural corral for resting the cattle. Finally, I found another crossing that appeared to have no relationship to the wagon trail. This trail is very wide and heads northeast, crossing close to the area of the probable cattle crossing but headed in a completely different direction. By following it in both directions, I determined this to be the Comanche War Trail, headed to Big Spring to the northeast and Comanche Springs, near Fort Stockton, to the south. These were two well-known watering stops for the Comanche on their raids into Mexico and back. The trail to the south did not follow the wagon roads and had the same indistinct properties as the trail to the north.



All trails leading in and out of Horsehead Crossing, looking from the west. (Google Earth)

The change in vegetation indicates the cattle trail, which parallels the wagon trail, which is very narrow and straight.



Drone image of wagon and cattle trails

12. Horsehead Crossing Station

Although it's long been known that the Butterfield Overland Mail built a stage station about a half mile upriver from Horsehead Crossing, the site's location has never been specifically identified in any archeological publications. Found in the National Archives and published by both Patrick Dearen and Glenn Ely was a hand-drawn 1869 map of the location of "old" Horsehead Crossing Station, giving the starting point for the search that revealed not only the location of the station but the Pecos River ferry crossing site used by the Butterfield Company.

When the Butterfield Overland Stage came to the Pecos River on its inaugural run on September 26, 1858, the Horsehead Crossing Station did not exist yet. The future location was no more than a camp of one Butterfield employee and 15 Mexican hired hands. The lone rider on the stage, Waterman L. Ormsby, a newspaper reporter for the New York Herald, described the event.

> ***"As I lay dozing on the seat, about three o'clock on Sunday morning, I heard a cry from Jones that we had reached the Pecos River, and there we were, sure enough, right into it. After hallooing and blowing our horn, we obtained an answer, as we supposed, from the other side of the river, telling us to drive up stream which advice we followed, when to our astonishment we found ourselves in camp on the same side of the river. The fact is, the Pecos makes such a turn here that you can hardly tell which side you are on…***
>
> ***We found that Mr. Glover had arrived with his train but a few hours before us and had brought the stock for stocking the road. He had employed here fifteen Mexicans, or "greaser" as they are more commonly called – and a more miserable looking set of fellows I have never saw."*** (Ormsby)

Several items in this description indicate the location. The camp was upriver from Horsehead Crossing, proper, and it was inside a large bend of the river, with the river practically encircling the bend, leading to the comment, "You can hardly tell which side you are on."

Another telling item is the number of Mexicans Mr. Glover had with him. It does not take 15 Mexicans to lead a mule train of 22 mules tied together. Thus, these Mexicans were very likely

brought in to stay and build the station as well as run the temporary camp that would meet the stagecoaches twice a week, one from each direction.

It appears the same thing was already ongoing at the next station up the river, Emigrant Crossing Station. Again, Ormsby described it as they arrived after a grueling trip from Horsehead Crossing.

> ***"The three Americans in charge of the station had, with the assistance of half a dozen greasers, built a very find "adobe" corral, and had started a house of the same material, and calculated that they could defend the stock against a whole tribe of Indians."*** (Ormsby)

The design of the Emigrant Crossing station was an adobe corral and building compound, very much like other Butterfield compounds, whether they were constructed of stone, wood, or adobe. The corral and living structure were one enclosed compound for protection of both the stock and occupants from Indian raids. The stagecoaches would drive right into the compound before unloading their passengers and changing out the mules for the next portion of the journey.

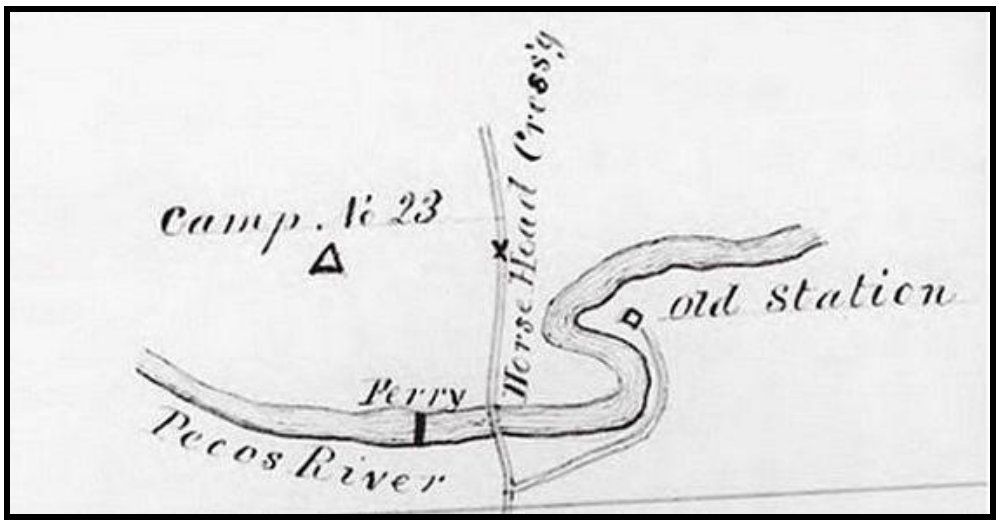
Horsehead Crossing Station was probably completed in the spring of 1858. But it wasn't long after that the route was dramatically changed, abandoning the northern route and moving to a southern route from the Pecos River through Fort Stockton, Fort Davis, and Fort Quitman before heading on to El Paso. They accomplished this by building a ferry system rather than attempting to get a coach across the muddy and swift river. They continued with this method until the station was closed.

Forage for the animals was brought from Head of Concho Station, 79 miles east. Indians attacked the station at least twice, running off with the mule stock and stealing whatever they could. (Ely) The station and all other stations were finally ordered to be shut down in March 1861 due to the onset of the Civil War.

Finding The Station

The main item of historical significance related to the specific location of Horsehead Crossing Station is a hand-drawn map from Brevet Lieutenant Colonel Thomas B. Hunt from his expedition of 1869 through the Horsehead Crossing area on his way to Fort Craig, New Mexico. This map shows Horsehead Crossing proper, which his unit proceeded through, but he also

identified the “old station” in relation to the regular crossing point. This specific river bend can now be easily identified through Google Earth satellite imagery.



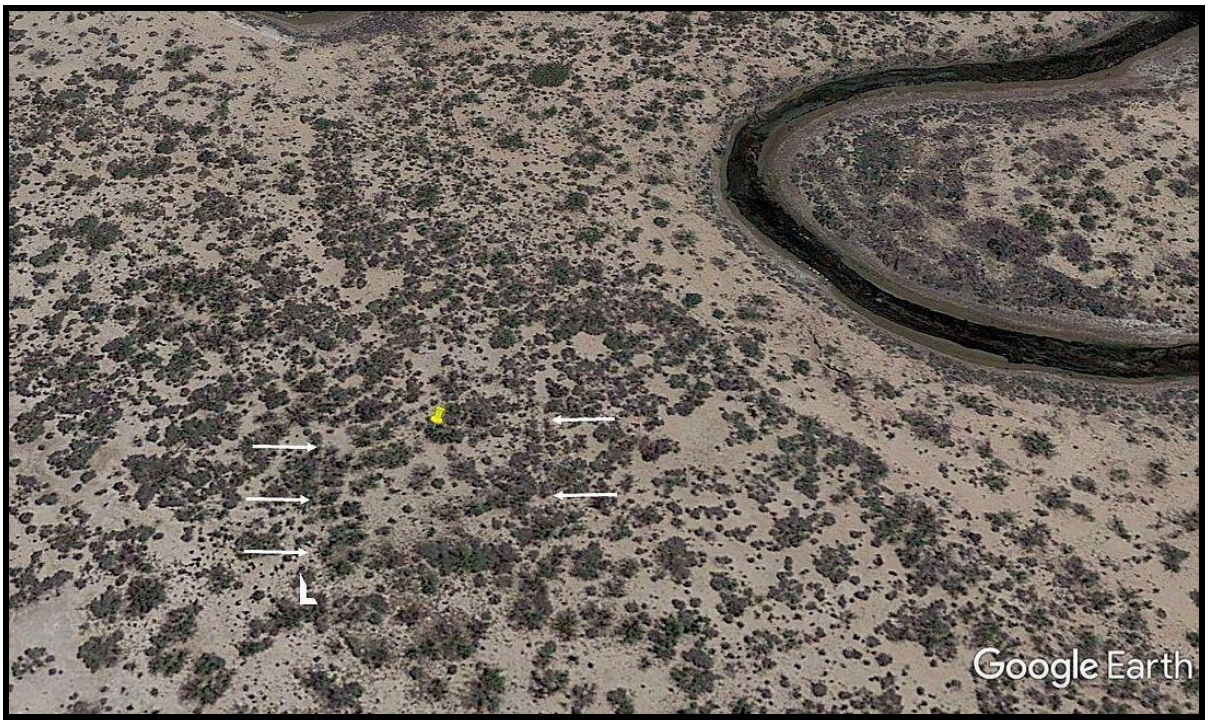
Brevet LTC Thomas B. Hunt, 1869 map (National Archives)

Comparison of Hunt's 1869 map and identified the location of station through imagery interpretation.

When searching in an area that has had little human activity but has seen great effects by the natural forces the thing to look for within the vegetation is unusual straight lines, 90-degree

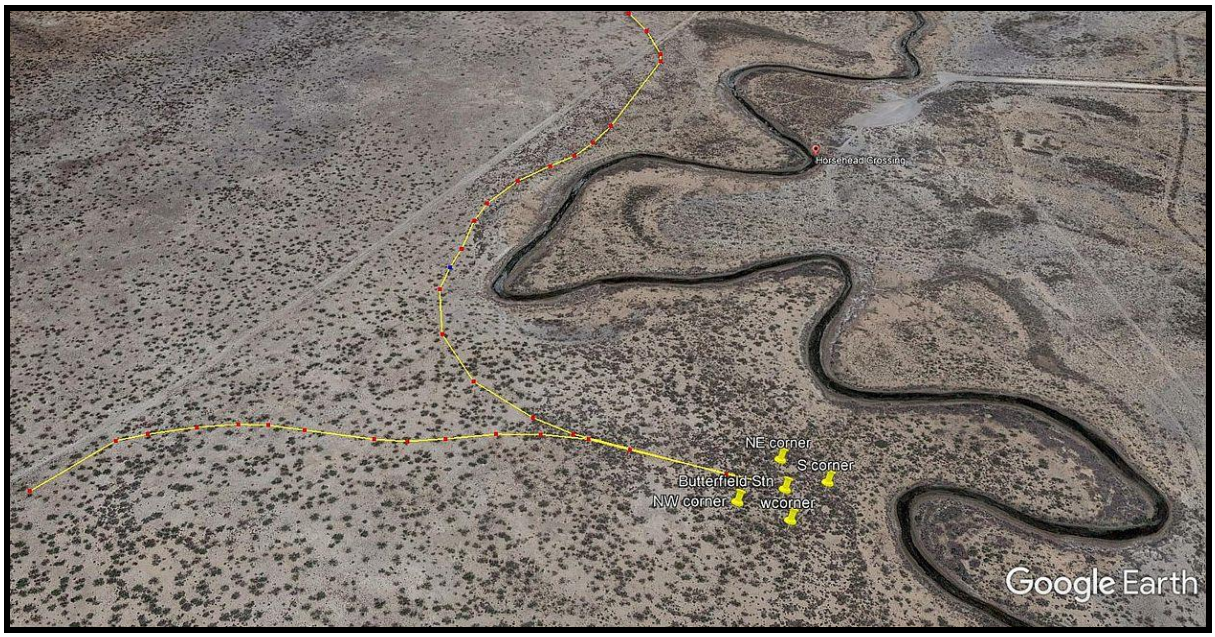
angles, and unusual greening of an area that has no perceptible reason for such greening. The area of this bend is completely restricted to cattle due to the dangers of the mud and is fenced off by the ranchers.

The application's historical capabilities are invaluable to searching properly using Google Earth since images will be taken in different seasons throughout the years. Years of drought may reveal things covered during years of wetter weather. In this case, 2014 was a drought year that revealed the anomalies in the vegetation. Two straight-line remnants of wall structures and one 90-degree angle can be seen in this image.



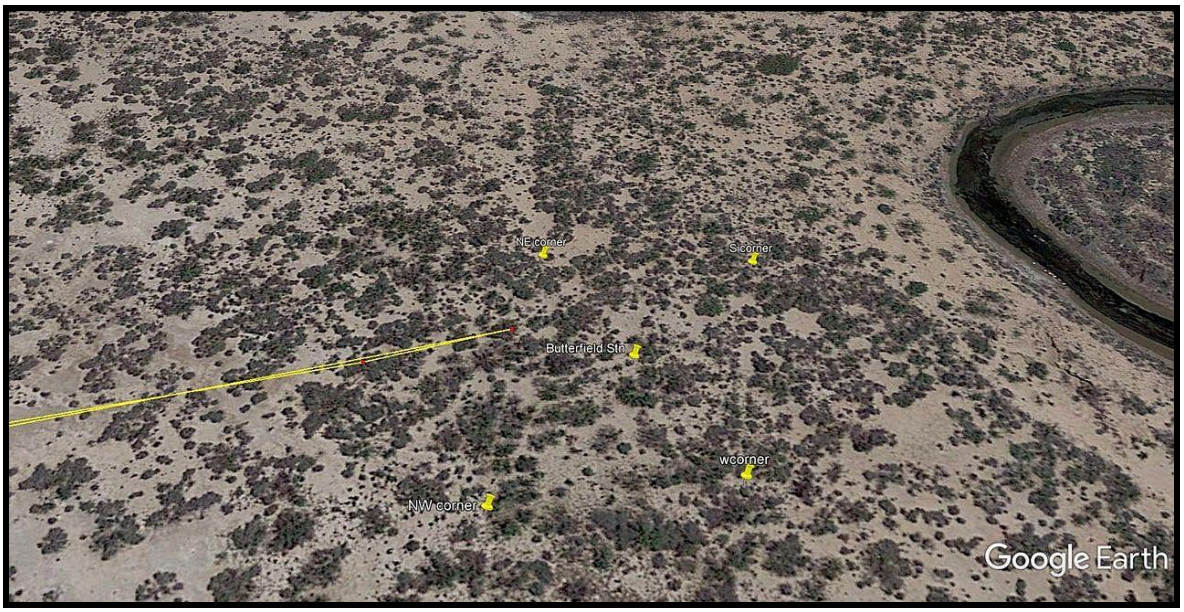
Anomalous straight lines and 90 angles in vegetation

After finding what appears to be the remnants of a structure, it is then time to look for roads leading to it and from where they come. In this case, a well-known wagon road from the Horsehead Crossing cutoff heading upriver to the next crossing point, Emigrant Crossing, passes by this bend in the river. From that wagon road, another, less well-traveled wagon road can be seen in satellite imagery leading in and out of the bend and directly to the location of this former structure.



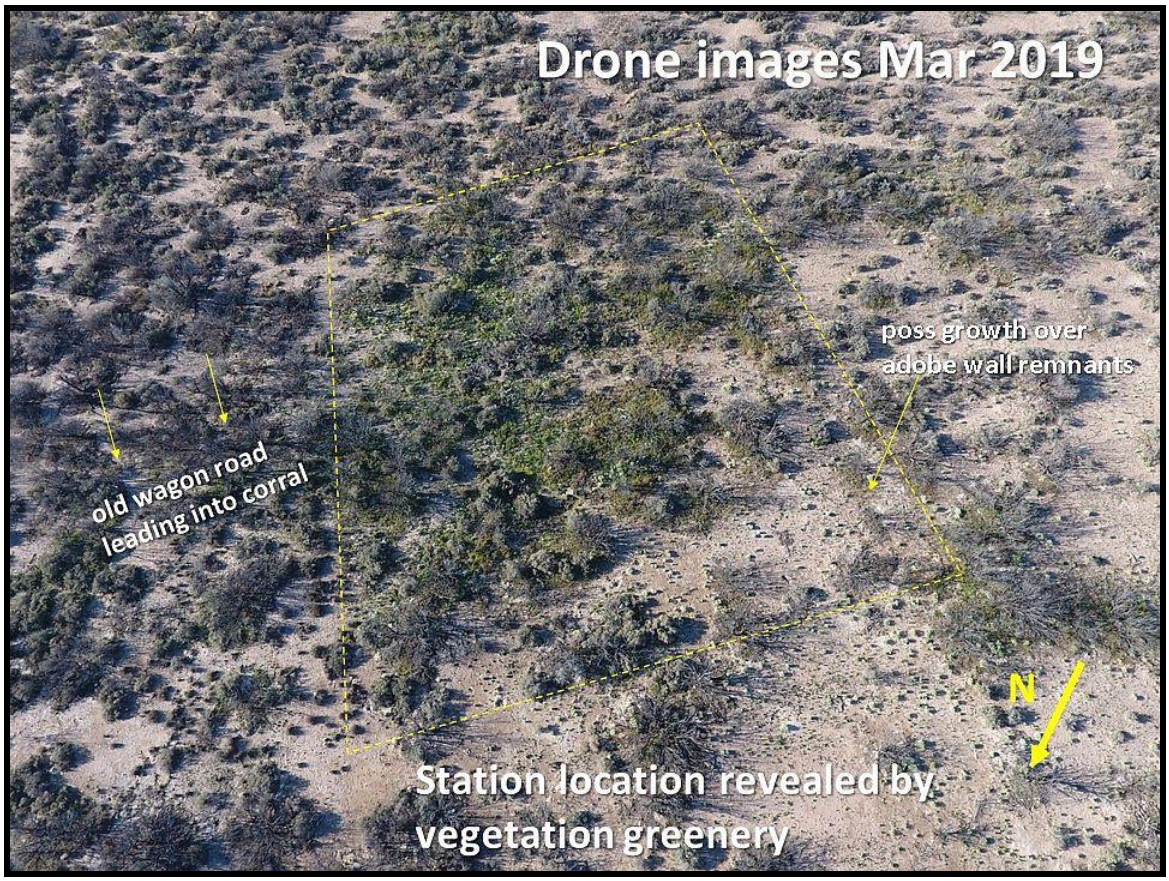
Wagon road leading in and out to the former structure. Note: Long straight line in upper left corner is modern fence line.

Additionally, this road leads directly to the rear portion of the compound. This would be the corral area. In a description given by Butterfield employee J.M. Browne, the adobe compound layout had the corral area to the rear (nearest the river) and the building to the front. (Ely) It was common for Butterfield stations to have the stagecoach drive directly into the compound for the safety of the passengers and station keepers while changing out the mules.



Wagon road leading directly into the rear of the compound.

One aspect that reveals the station location, in addition to the 2014 satellite image, is the drone images taken in March 2019. The drone reveals the site is the only location in the bend with greening vegetation and it is all within the rectangular shape of the old compound. It is common for former building sites to take on a completely different vegetative cycle after the site is long gone. This is due to the process of bioturbation during and after the period of occupation. Bioturbation is the alteration and disturbance of a site by living organisms through the mixing of sediments. In this case, it is both human and animal waste products changing the soil which makes it a better soil for plant growth - similar to mulching of a garden - but is a completely unintentional and natural process. The most greening of the site is to the rear, where the mules were kept.



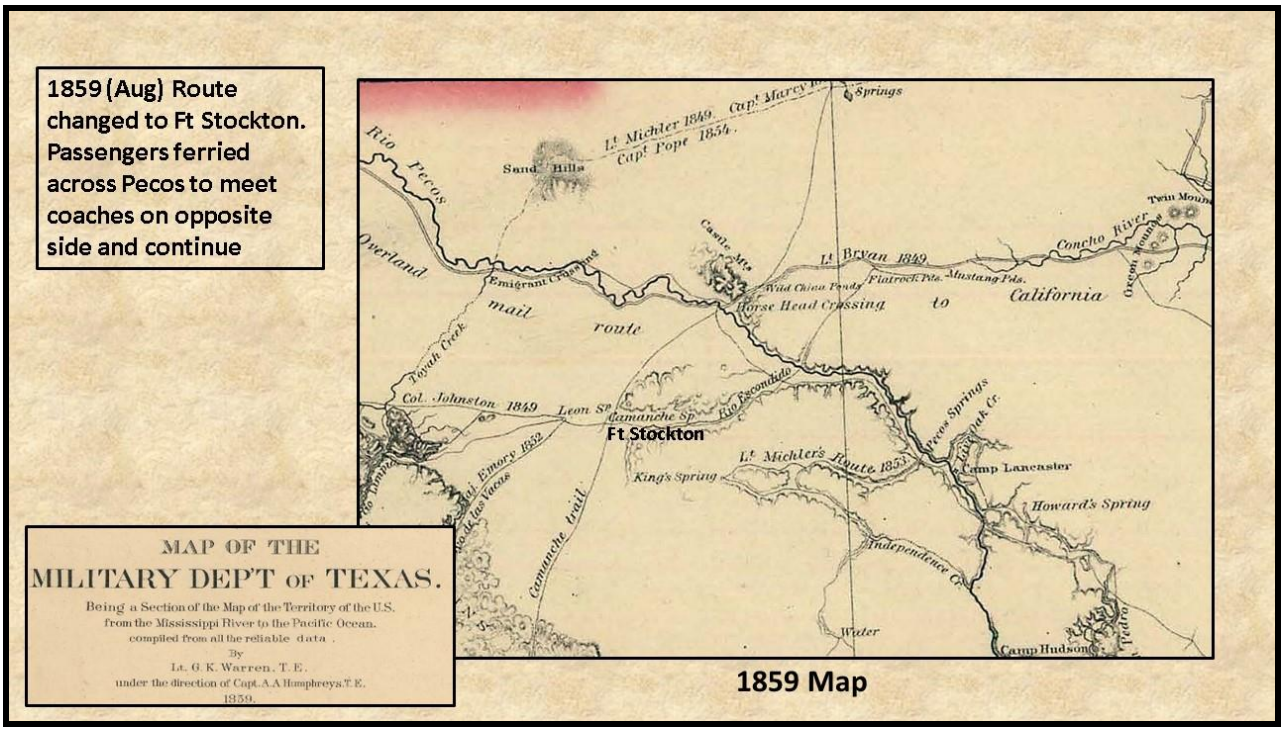
Inside the rectangle, the vegetation is greening, whereas the rest of the river's bend is still dormant at this time of year (early Spring). Notice the wagon trail running right into the rear of the compound.

One wagon trail within the bend that was not the main road leading in and out was at first puzzling. It ran from the station directly to the river in a southerly direction. This road can be seen as a series of bushes in a straight line. The only reason for natural growth in a straight line

would be some change in the earth that would cause the land to be lower for a distance and in a straight line. That was not the case here. The line of bushes beginning at the station and on level land has to have been created from a former wagon road.

The documented Butterfield ferry system answers the question of this road's purpose. In August of 1859, it was decided to forego the route further north of Horsehead Crossing and begin operations from Horsehead Crossing south to Fort Stockton. The change was made for several reasons: 1) to add the forts Stockton, Davis, and Quitman to the mail route 2) better water sources 3) more passengers were available on the lower route. (Green)

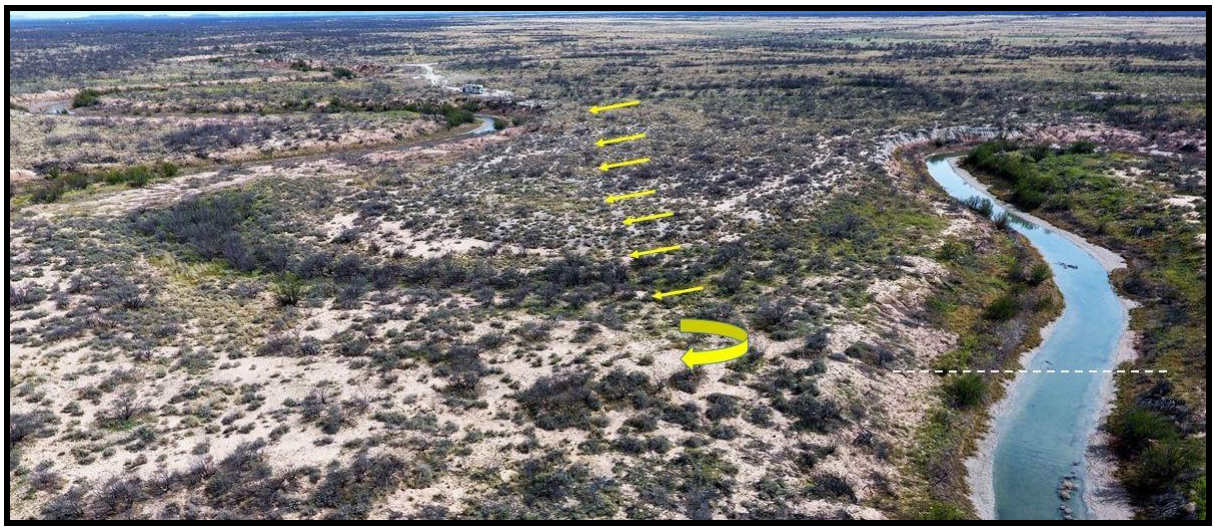
The company built a ferry system near the station to accomplish this change. Coaches could not cross the muddy and deep Pecos River, and they had no better crossing anywhere to the south. The coaches would arrive on each side of the ferry points. Passengers and mail would be ferried across using a small skiff-type boat. (Green/Ely/Dearen) The skiff probably was connected to a rope line to keep it from being swept downstream with the strong current. From this point on, the station continued to operate under this route and methodology.



1859 map of road from Horsehead to Fort Stockton ('Ft Stockton' added for location)

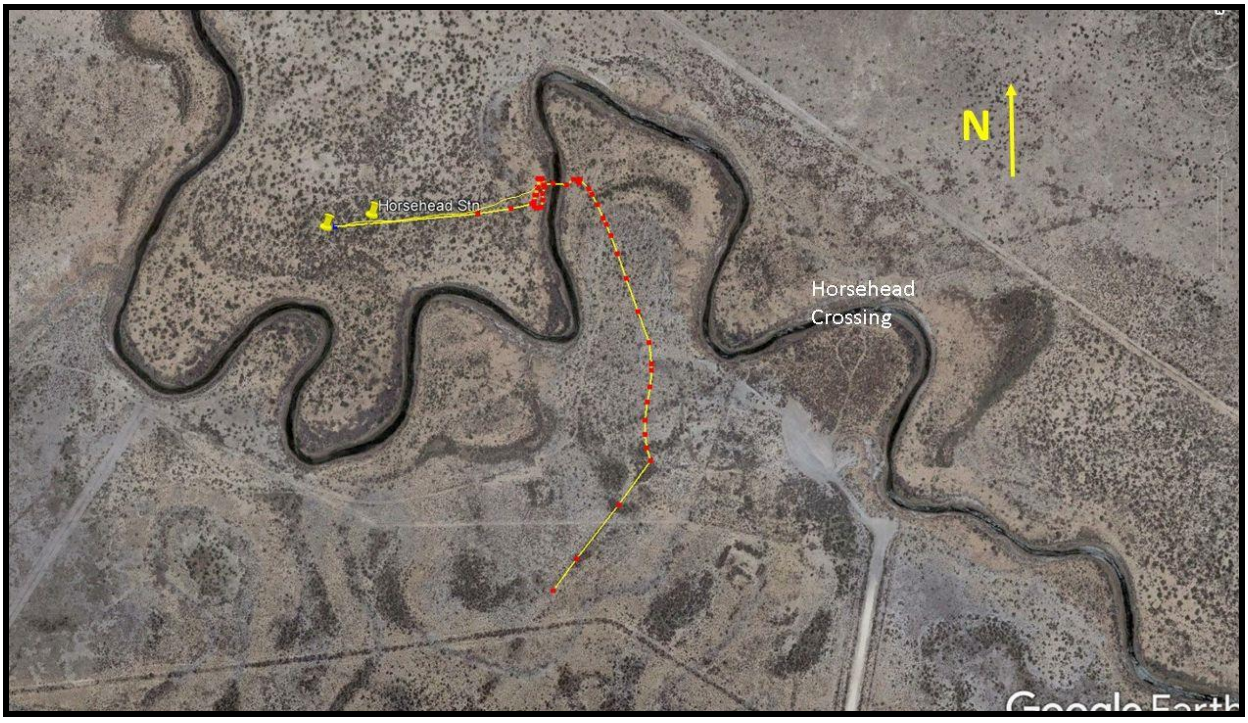
A wagon trail on the other side of the river is required to verify that the wagon road from the station was for the ferry crossing. As a result, a wagon trail can be seen departing the established

Fort Stockton road before it reaches Horsehead Crossing proper and heads straight to the river bank directly opposite from the wagon trail turnaround on the other side.

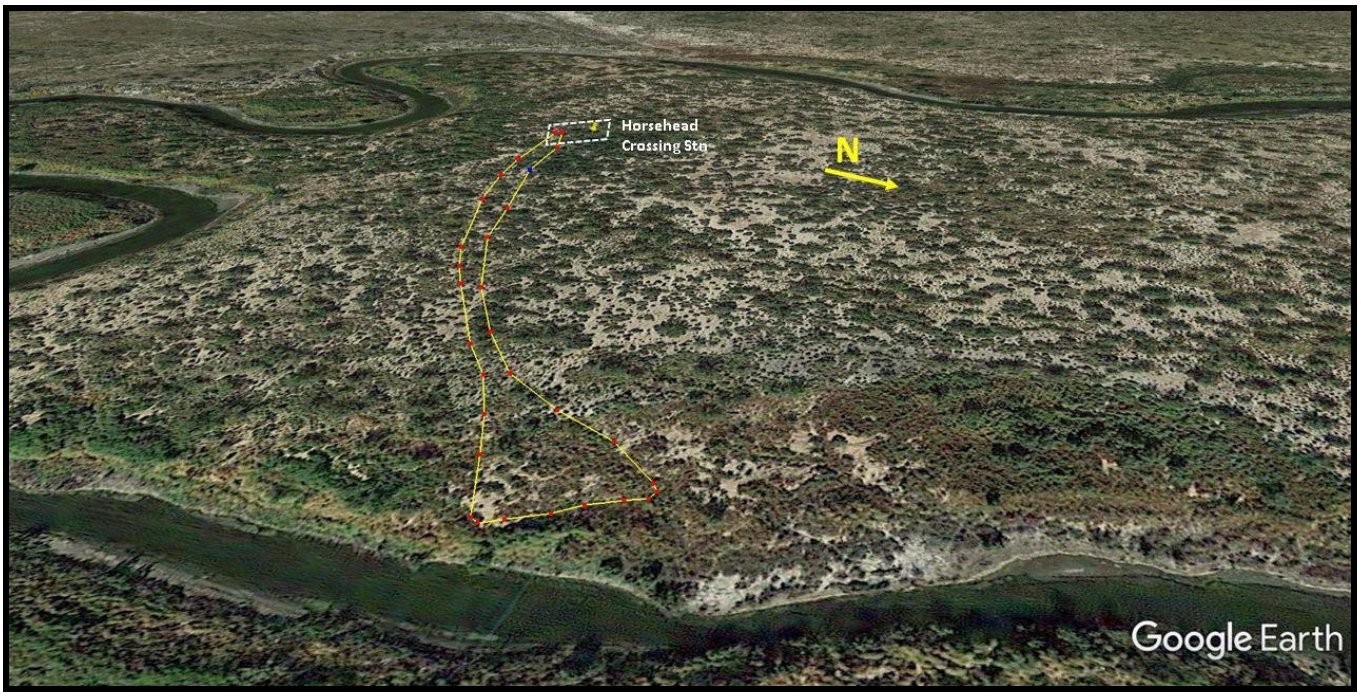


Dark line of bushes is old wagon road from Fort Stockton road to ferry west side crossing point

On the west side of the river, the road came to what looks like a turnaround area. On the east side, the coach may have driven along the bank in a loop around and back to the station.



Roads from Ft Stockton road and stage station leading to opposite sides of river



A loop wagon road from stage station to river and back to station

Reconnaissance

The many floods have eliminated any evidence on the ground through this area. Although the river is now a timid reflection of its earlier self, floods of the past were devastating. The Pecos River has a long history of flooding: 1904, 1950, 1952, 1954, 1978, and 2014. (Dearen) The 1954 flood, for example, crested down the river at 96 feet and was 3 miles wide, taking entire bridges out as it raged down through Texas.

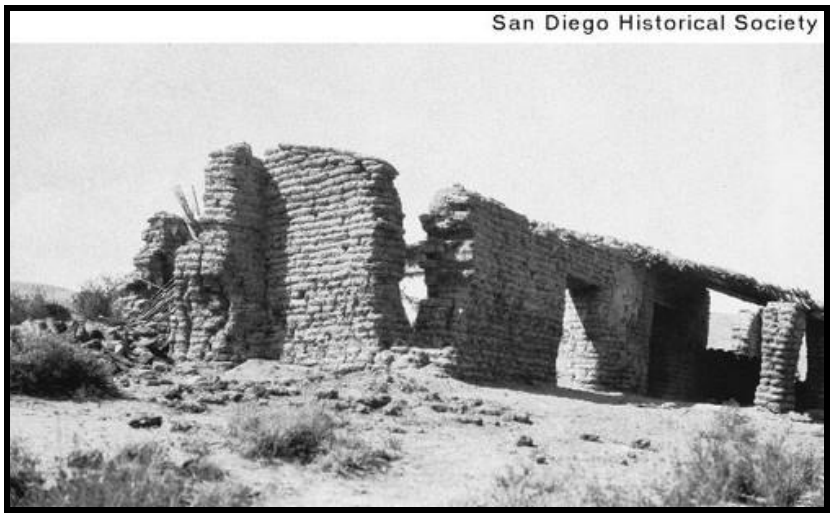
Although our time on site was very limited, we conducted a thorough surface search and metal detection sweep. The metal detection sweep was negative. This is probably because it is estimated that there is approximately 12 to 18 inches of flood soil on top of any remaining objects left from the station, and the metal detector used cannot reach that depth. Additionally, it is known that artifact hunters did find this site in the distant past, probably removing some of the few metal artifacts found. Artifacts were probably very scarce to begin with since this site was somewhat off the main wagon road, and the station was only in operation for two years. Finally, the station was likely constructed out of adobe, making it vulnerable to flooding.

On the Butterfield stage inaugural run, Ormsby commented on the next station up the line being still under construction by Mexican workers. It was a full adobe compound – corral and building

combination. This was likely the same design and construction method used for Horsehead Crossing Station. The soil along the Pecos River in this area is a very sandy loam, the perfect soil for making adobe bricks. It is also the most vulnerable to flooding.

Using the Google Earth measuring tool on the best 2014 imagery of the wall remnants indicates the walls were about 3 feet thick. This is an expected width for an adobe structure since there is very little reinforcement, and a thick wall is necessary to maintain the structure's integrity.

Butterfield's Vallecito Station in San Diego County, California, is a good example. This 1953 photo from the San Diego Historical Society clearly shows the width of the walls.



Vallecito Stage Station, San Diego County, CA (1953)

Horsehead Crossing Station Summary

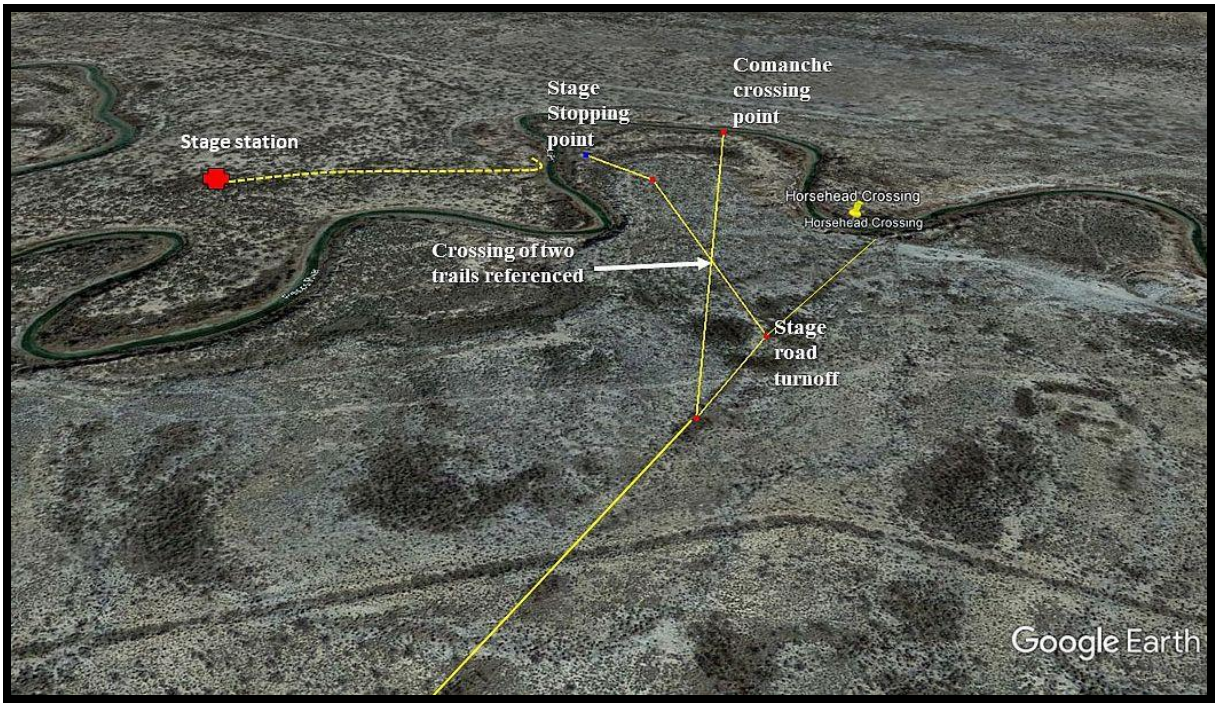
Satellite and drone imaging can locate the sites of old stage stations, even when they have been completely removed from the landscape, and can be used to follow the wagon road directly to the site, supporting the site's location. The only green vegetation in the entire horseshoe bend at the site in the early spring of 2019 was at the site and in a rectangular layout. This is caused by bioturbation and is a telltale sign of previous human habitation when looking for old sites of this type. The measurement of the remnants of the wall structure from the imaging supports that this station was probably an adobe structure with walls approximately 35 feet thick. The location matches the hand-drawn 1869 map by Brevet Lieutenant Colonel Thomas Hunt, adding to the supporting evidence of this being the correct location. Floods either swept away or buried deep any remnants. The documented stagecoach ferry system is also revealed by old wagon roads,

one coming from Fort Stockton to the river's edge and the other leading from the station and back in a loop. Both end up directly across from each other on each side of the river.

13. Horsehead Crossing To Fort Stockton

A first-hand historical account validates this Comanche War Trail water crossing point near Horsehead Crossing in an unexpected way. The year was 1859, and the Butterfield Overland Mail route had been changed from continuing up the Pecos River and crossing the Guadalupe Mountains to a new route down to Camp Stockton and on to Fort Davis and El Paso through a southern route. A westbound passenger noted after leaving from the west side of the river on the way to Camp Stockton the coach crossed "eight beaten paths, side by side [which] indicated the frequency of their bloody raids into northern Mexico for cattle, horses, and children." (Dearen)

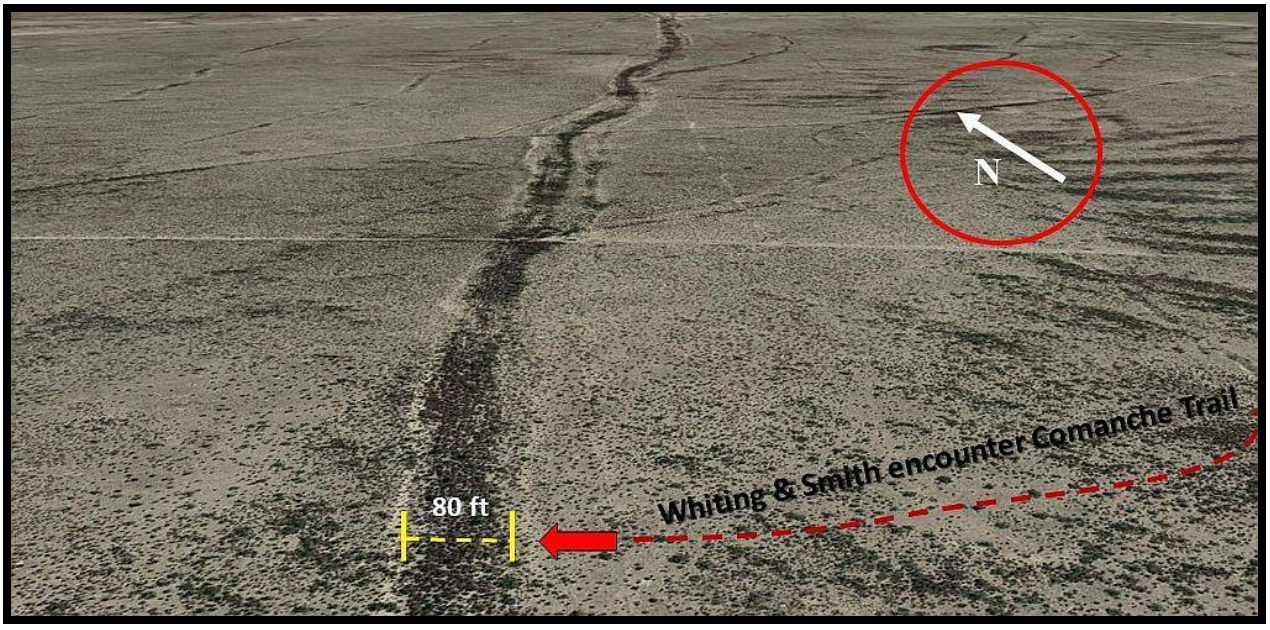
The crossing point mentioned by the passenger can be found through Google Earth analysis of both trails. Although the stagecoach/wagon road becomes one with the Comanche Trail just a little further to the west, the two trails diverged to their separate crossing points, making an X just before each reached the water line.



Two Trails Cross - Horsehead Crossing looking northeast

As you can see in the image where the wagon road and the Comanche War Trail merge into one soon after leaving Horsehead Crossing. The wagon road runs right down the middle of the Indian trail to Fort Stockton. At the time, I'm sure there was no brush growing up as it is today, and it was the easiest ready-made road for the stagecoach and wagons. The road makes a straight line to a low plateau seven miles from the river. Although the wagon road is about eight feet wide, the brush scar averages 40 feet wide to the plateau.

Earlier, in 1849, when the area was first being explored for a route from San Antonio to El Paso by the Lieutenant William Whiting And Smith Expedition, they came across the Comanche War Trail while following the Pecos River on the west side. Their journal states they came across "a large Comanche war path which filled us with much astonishment. Close together, 25 deep worn, and much-used trails made a great road which told us this was a highway by which each year the Comanche of the north desolate Durango and Chihuahua." (Williams)

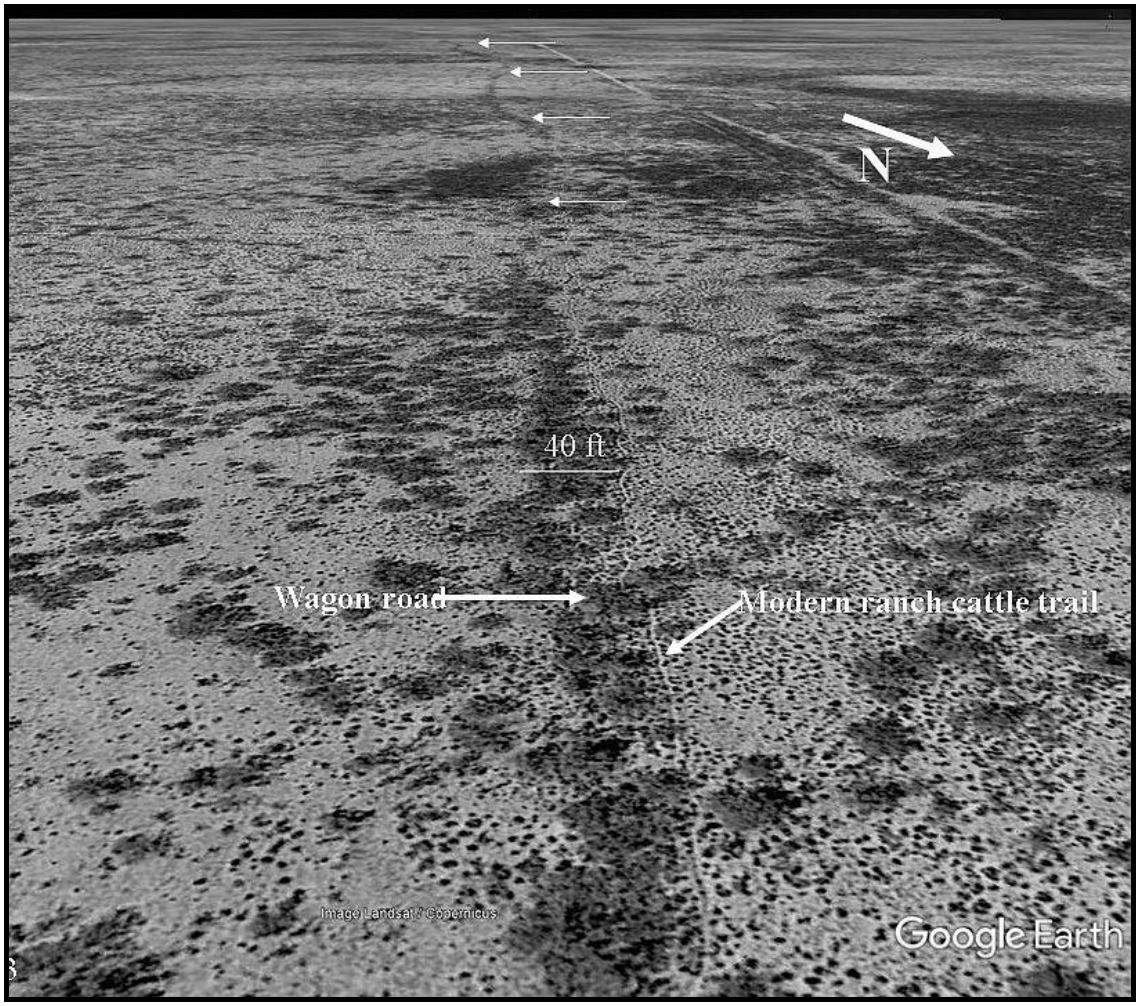


Whiting & Smith Encounter Location

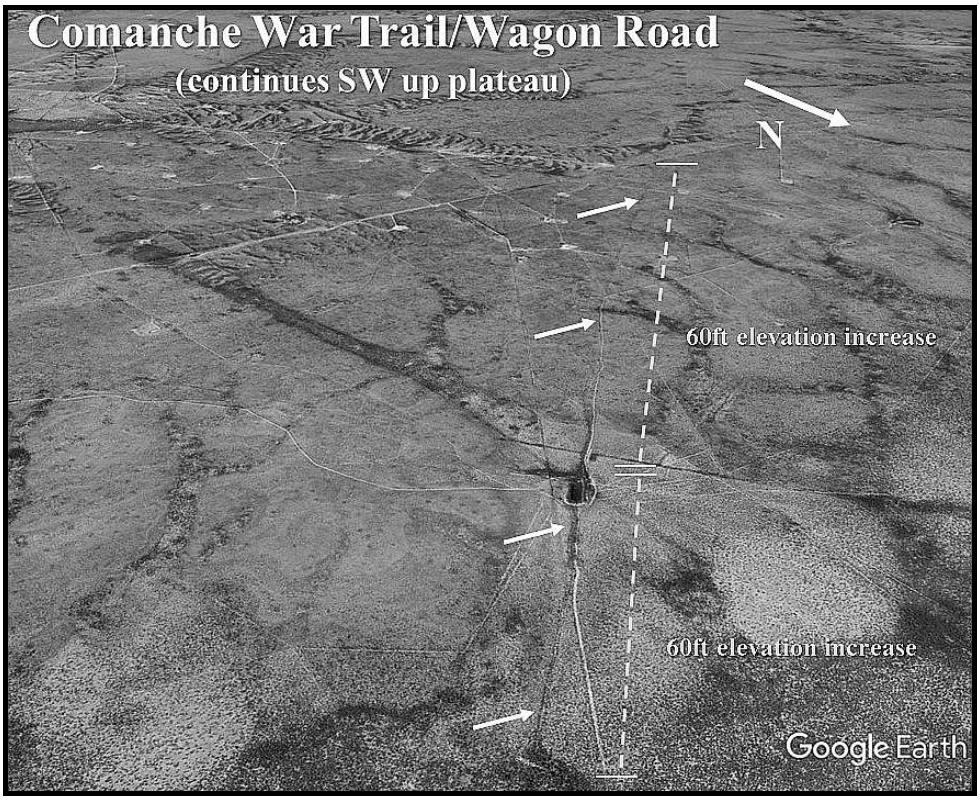
By following their general path before coming across the trail, which was provided in some detail, it appears the party was already up on the plateau where the Comanche War Trail is the widest when they came across it. This would explain their description of 25 deep-worn trails. It also states they traveled on the trail for five miles to camp at Antelope Spring, which was the spring close to the later stagecoach station, addressed further in this report. That again verifies the location of their intersecting the Comanche War Trail up on the plateau and at its widest

point. From Antelope Spring, they followed the trail to what they described as southwest to a high table ridge, now known as the southern point of 7-Mile Mesa, just before you enter Fort Stockton.

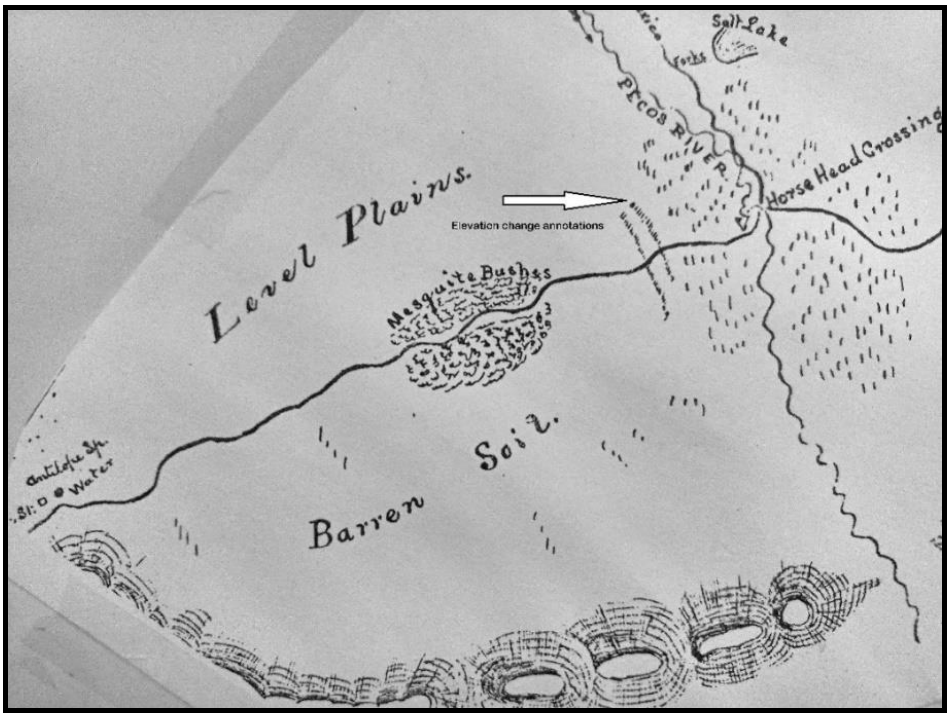
As the trail comes to the plateau seven miles from Horsehead Crossing, it climbs a draw leading up to the flat. It makes two elevation changes of 60 feet each. This is the second piece of information that validates this as being a trail and wagon road. In 1867, Brevet Lieutenant Colonel E. J. Strang conducted a large unit march from Fort Stockton to Fort Chadbourne, making a detailed topographical map along the way. He used the main wagon road, and as he came off the plateau heading to Horsehead Crossing, his topographer annotated two elevation changes on his map that matched the ones seen on Google Earth.



Trail leading away from Horsehead Crossing to the southwest

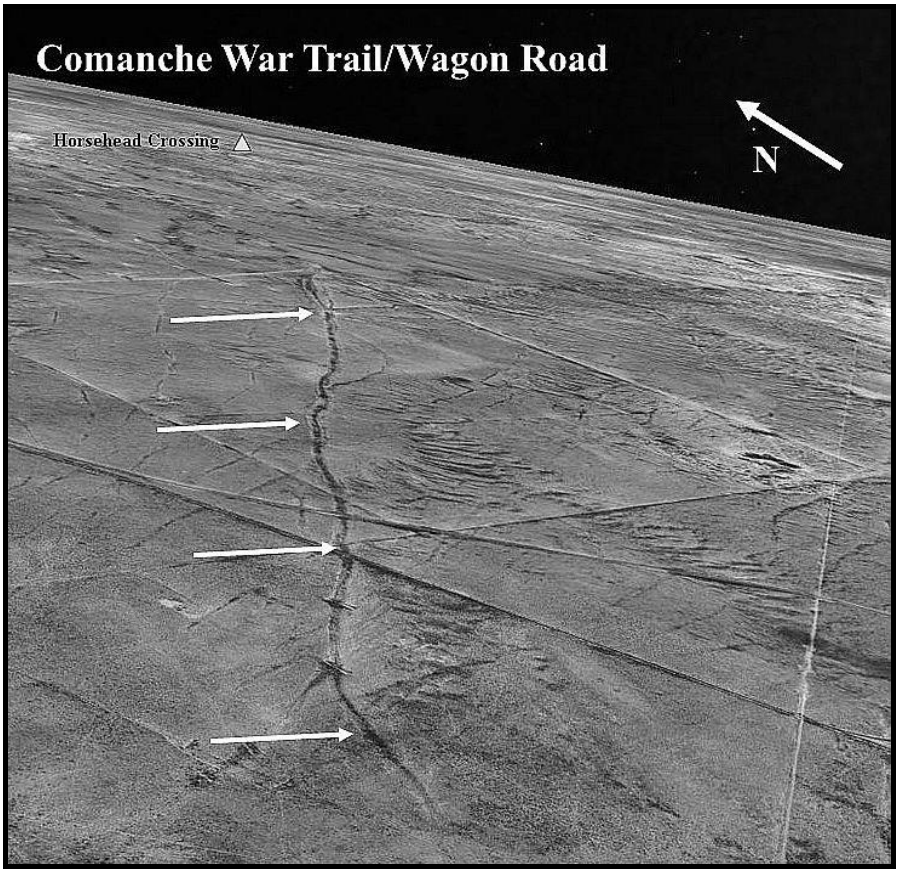


60-foot elevation changes leading up to plateau



Brevet LTC Strang map with elevation change annotations

After the trail moves to the plateau proper, it becomes apparent from above. The trail becomes wider, and the after-growth brush is thicker. The width ranges from 80 to 130 feet in this area, and the scar is very distinct. In a close-up view, you can also see the wagon road continuing down the middle.

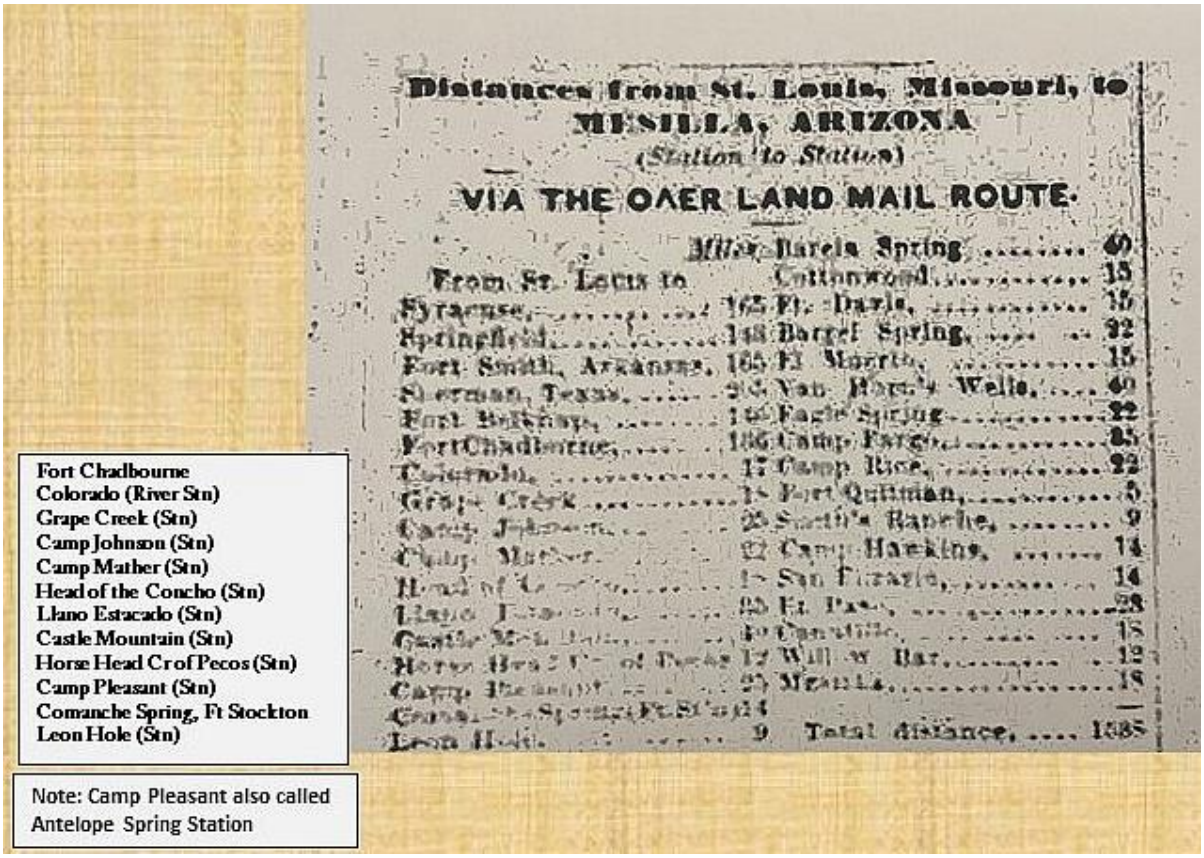


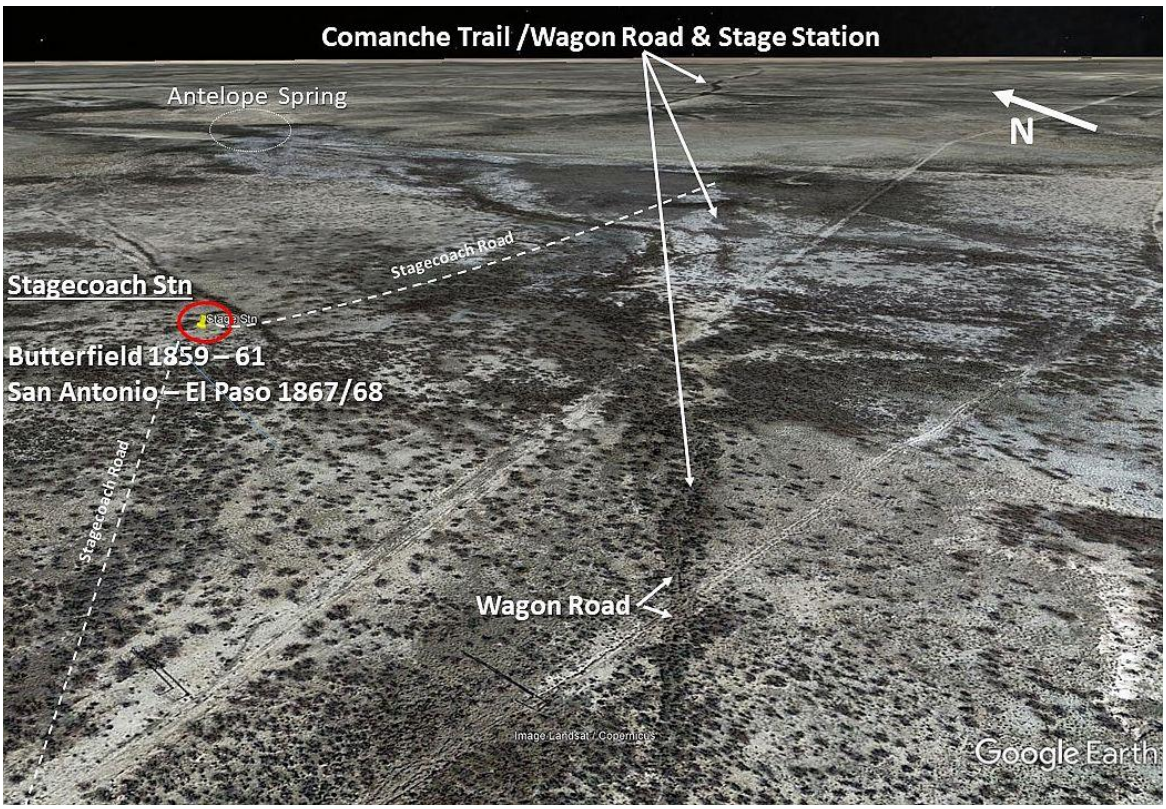
Comanche War Trail looking northeast back to Horsehead Crossing

14. Antelope Spring (Camp Pleasant) Station

This station was located just off the main wagon road, running down the middle of the Comanche Trail. Antelope Spring drainage ran to the station and was its water supply.

Antelope Spring Station, also called Camp Pleasant Station, sits just off the main road, 23 miles from Horsehead Crossing and 11 miles outside Fort Stockton. Pleasant was a common surname, and may have been the station agent, similar to Camp Mather. Solid documentation shows that the Butterfield used this route as early as November 1858 to freight packages from communities and forts on the Lower Road to Horsehead Crossing. (Ashmore)





Antelope Spring (Camp Pleasant) Station

The area in and around the former building is littered with dishware and glass, much of it probably from a later period than the Butterfield Overland Mail due to the fancy designs and colored dishware. This analysis comes from our previous excavations of three abandoned Butterfield Stagecoach Stations in West Texas that were never reconstituted as stations. All Butterfield-period dishware was very common and had little design. Station managers were honing out very crude living conditions in a barren and hostile country at the time.

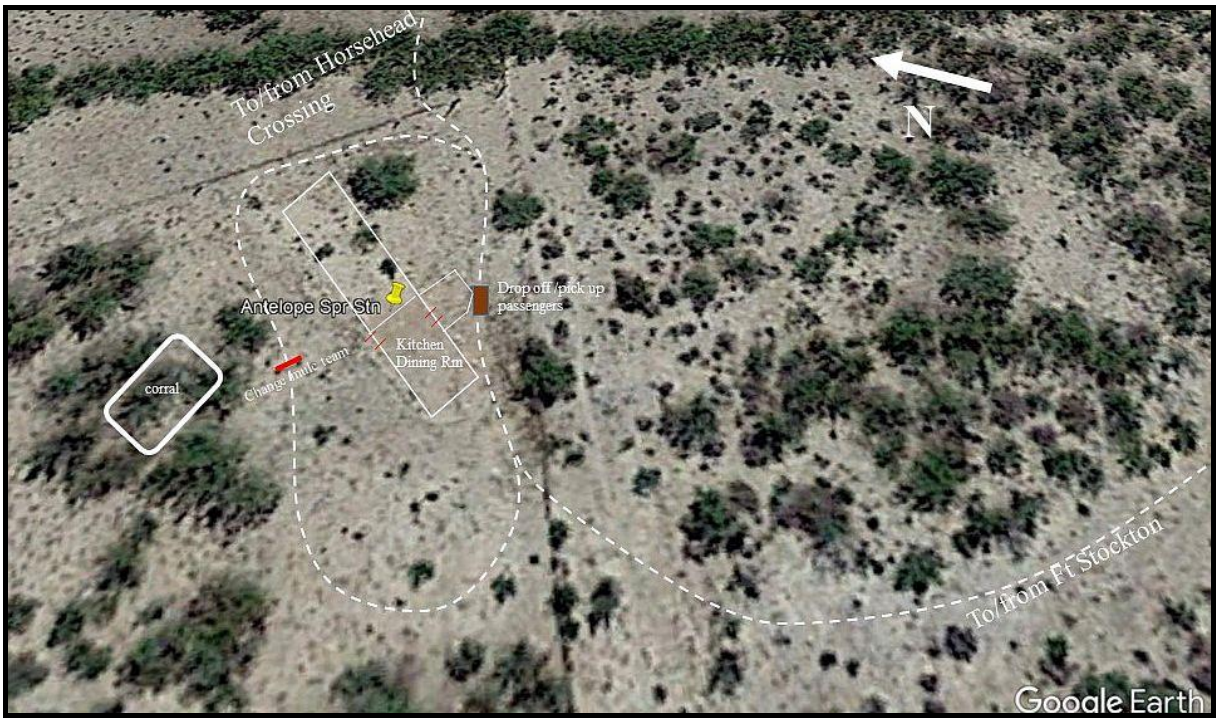
This dishware can be explained by the fact that this station was reused after the Civil War by the San Antonio To El Paso Upper Road Stage Line, also referred to as the Ben Ficklin Stage Line. The contract began in July 1867, but the first stage ran the Lower Road in October because the Upper Road was not yet ready. The Upper Road stage line used the same route to Fort Stockton as the old Butterfield mail route. This means Antelope Spring Station was probably in the restoration stage beginning shortly after July 1867. The Upper Road line began in March of 1868. On June 3, 1868, T. G. Williams, the agent in San Antonio, announced express mail service through to El Paso in 6½ days. The stage left San Antonio on Mondays, Wednesdays, and Fridays at 8 a.m. (Ficklin Mail Service).

However, the Indian problems became so acute at Horsehead Crossing (and probably at this location) in the 1867-68 period that the commander at Fort Stockton ordered a new river crossing to be created 35 miles further downstream. The alternate location became known as Pecos Mail Station/Camp Melvin/Pontoon Crossing. (Ashmore) Camp Melvin was the military detachment stationed there. The new stagecoach crossing point was originally upriver at a site nicknamed Ficklin's Ferry in the fall of 1868. (Ashmore) Later, the entire operation moved to Pecos Mail Station, one mile down the river. So, the Antelope Spring station was probably only occupied for about six months. This was not unprecedented to reuse a former Butterfield Station. This same stagecoach line also reused Head Of The Concho Station.

We found one critical piece of evidence on our reconnaissance that supports this theory. A small piece of stoneware was found in the middle of the station in the room that was probably used to entertain passengers with meals. This room is the same size and same location as the one at Fort Chadbourne which was found to be a similar passenger meal and kitchen area. The artifact is a small piece of stoneware with a maker's mark. The maker's mark is from the Clementson

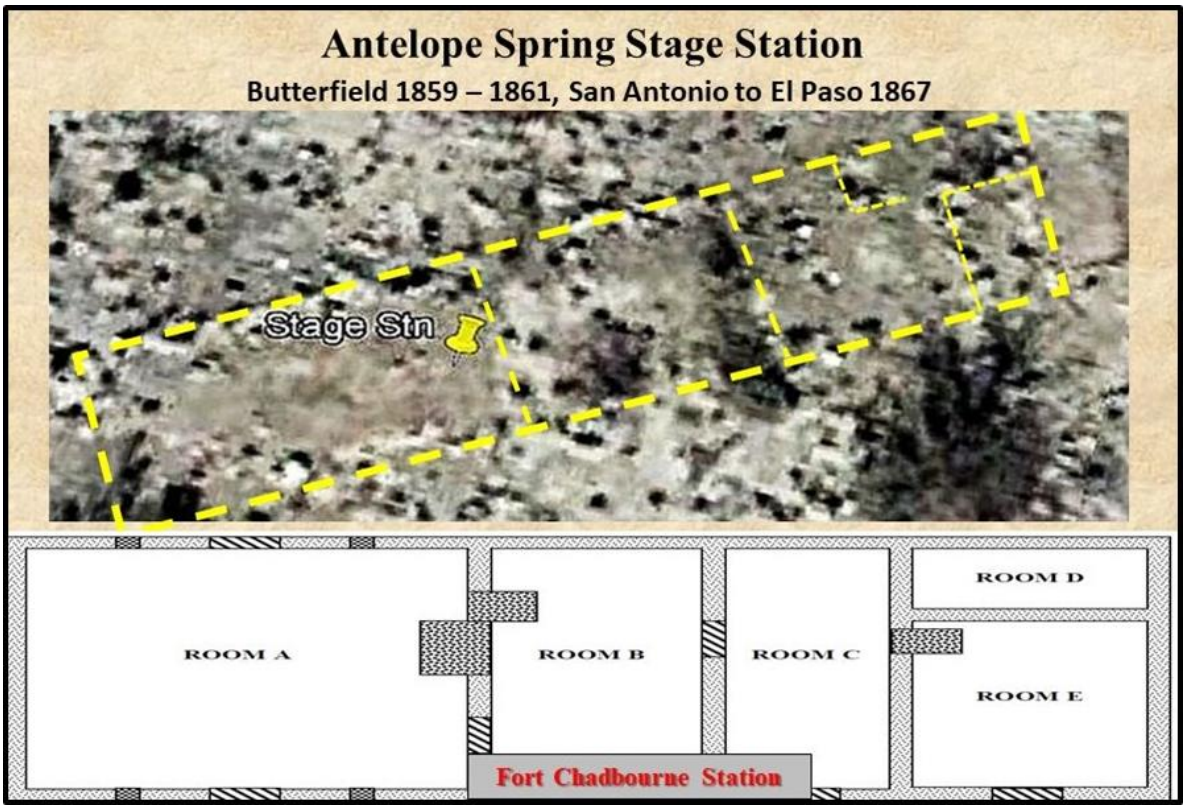
Brothers of Hanley, England. This maker's mark was only in existence from 1865 to 1910 (A-Z Stoke-On-Trent Potters). This fits perfectly for the period of the San Antonio to El Paso (Ben Ficklin) stage line initial period of 1867/1868. This would have been a prize possession of the station manager and an extremely unfortunate accident, but very fortunate for our research.

Stoneware Found Within Station Walls



Wagon route into and around station

This station was constructed much like the station at Fort Chadbourne, where we participated in the excavation in 2008 (Riemenschneider). The Fort Chadbourne station was a major station on the Butterfield route. Antelope Spring construction appears to have used the same design. It was the same length but 5 feet narrower. The internal rooms are also very similar in layout. Using conversions we were able to determine the station was designed in yard measurement, a common building measurement at the time. The folding yardstick was the most common tool for this type of work. For this reason, we are using their measurement method of yards throughout this report. The station measures 27 X 6 yards.



Comparison of Fort Chadbourne and Antelope Spring Stations

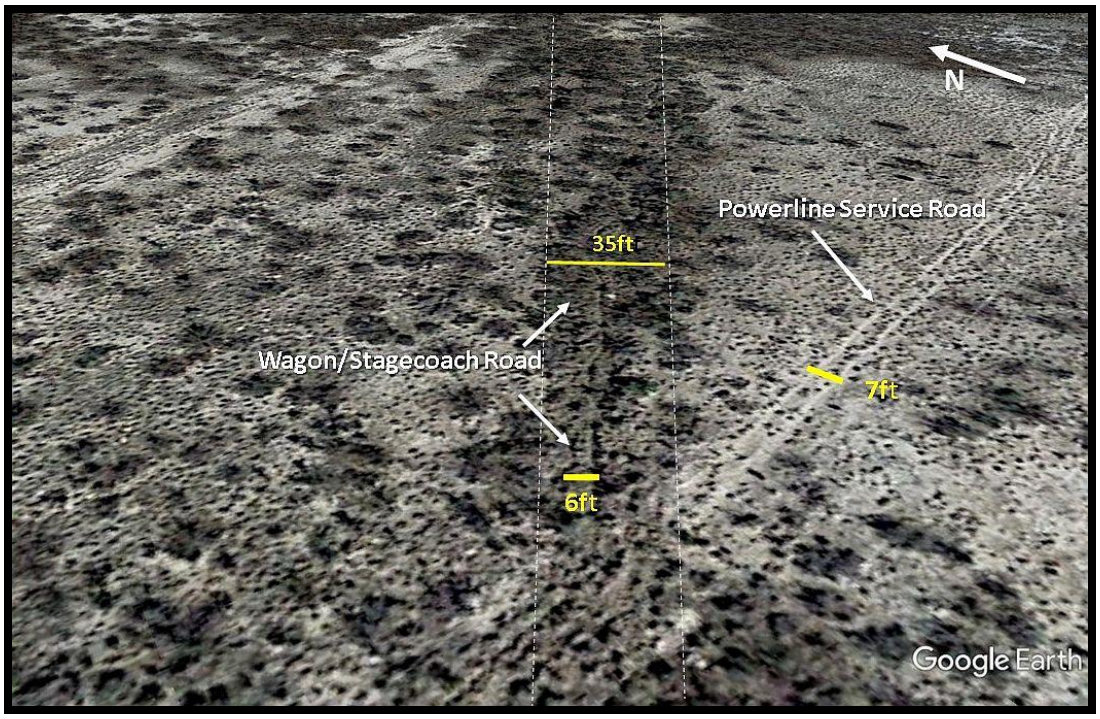
Passengers would have been dropped off at a south-side porch leading into the room listed in the Fort Chadbourne excavation layout as Room A. This is the same room where the critical piece of stoneware was found. Although only the base of the walls remains, a large pile of wall stones was piled 30 yards away and then abandoned at some time in the past. We found the stone pile mixed with many pieces of glass and dishware from the building, indicating it was bulldozed. Bulldozing was likely done post-WWII when bulldozers became commonly available through

army surplus. There is an old ranch cattle capture pen close by, and we can theorize that the rancher at the time decided to bulldoze the building to keep travelers or squatters from continuously using it and causing problems with the ranching operations. In the later period of the 1950s, even though the road may have been abandoned, the railroad was there and runs right by the site a quarter mile away. This abandoned site was probably well-known to most people in the area at the time. The West Texas section of this railroad runs from San Angelo to Fort Stockton and eventually on to El Paso. It runs through all the major towns along the way and is still in use today. The family memory of the current owner is that the rail line was used by travelers walking the tracks to Fort Stockton.

Antelope Spring Station Ruins

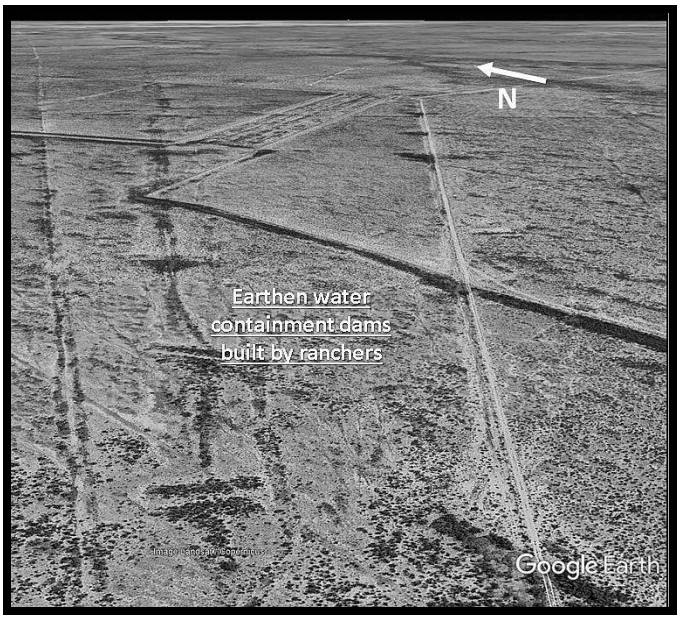
In addition to inspecting the stagecoach site, we walked the wagon road, finding it with the proper wagon rut depressions and wagon width. This road was used up to the early 1900s, and we found period tins and bottle trash from that era alongside the road. It was also very apparent that the soil in this area is very fine sand just beneath the surface. This is probably another reason the trail is more defined than in other regions.

Satellite imagery shows a close-up of the wagon road within the Comanche War Trail near the stagecoach station. A modern powerline road crosses this area, giving a good comparison of dimensions. The wheel tracks are 6 feet wide and rutted from the narrow wooden wheels.



Wagon road within Comanche War Trail after-growth brush

One interesting fact has come out of this imagery analysis. The trail is so wide and deep in many places that modern ranchers have built earthen dams across the trail to capture any rainwater that might accumulate from storms. In some locations, they are set as close as every 300 feet and in others as far apart as 700 feet. It also appears these earthen water containment dams were copied to other man-made modern ditches and roads, as can be seen here on the right side of the image.



Modern water containment earthen dams created within the Comanche Trail

From the stage station area, the Comanche War Trail/wagon road continues to Fort Stockton, winding around the southwestern tip of 7-Mile Mesa, just as reported by Lt William Whiting in his 1849 expedition.

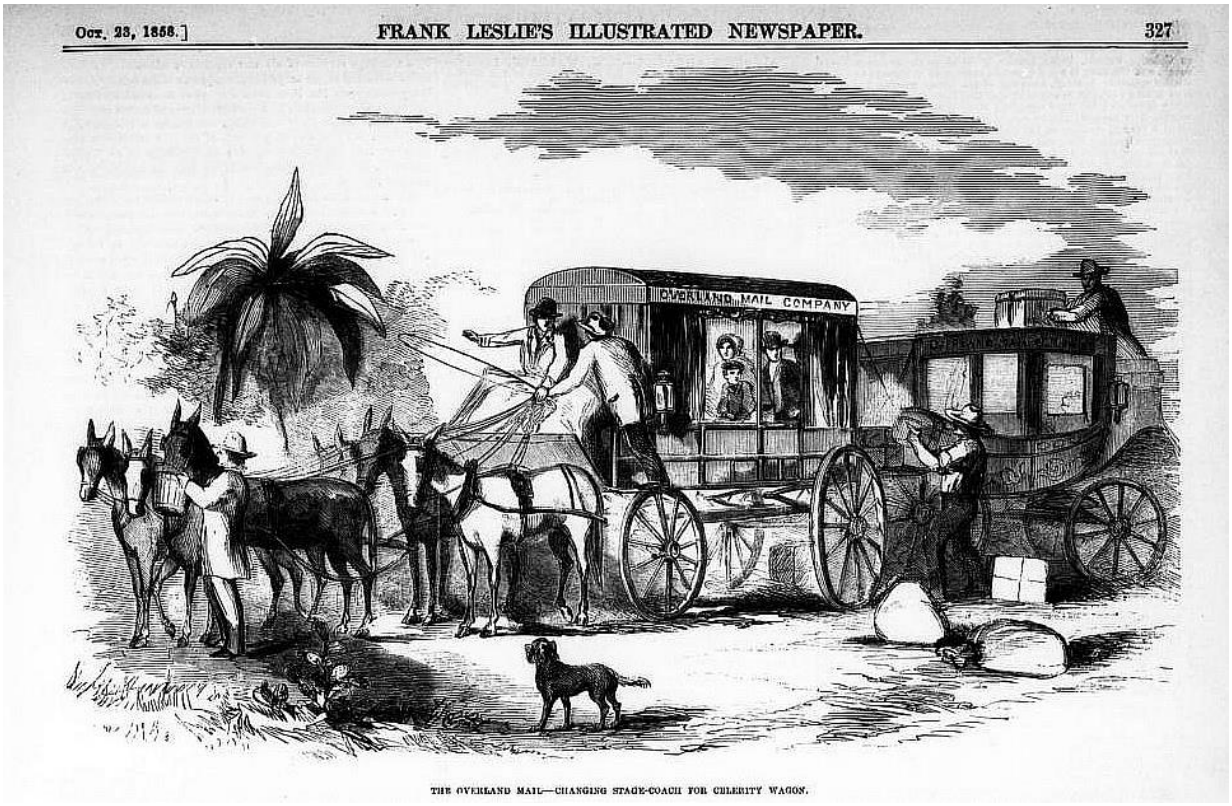
Comanche War Trail/Wagon Road Passing 7-Mile Mesa

Summary

The Butterfield Overland Mail was one of the most significant achievements in the opening of the American West. Before the construction of this road, emigrants making their way to the West Coast had to either pay an exorbitant price for months on a sailing ship or brave the wilds with very little to guide them across an extremely hostile environment. Many did not make it through using either option. The Butterfield Overland Mail Company constructed a formal road that could be used by their stagecoaches and any other travelers heading west. For the customers of the stage line, paying a reasonable fee and enduring 24 days of difficult but acceptable travel was more than a reasonable choice compared to the other options.

The trip through West Texas was by far the most severe portion of this route. It was so severe they had to construct special wagons driven by hardy and fairly wild mule teams to handle it. Each stage stop was approximately 30 miles. According to the schedule, they covered this desolate section – 165 miles - in 36.5 hours.

Hopefully, this study brings back to light some of the forgotten locations and a new understanding of the trail itself through this difficult region.



THE OVERLAND MAIL—CHANGING STAGE-COACH FOR CELERITY WAGON.

Tom Ashmore spent 22 years in the Air Force as a special intelligence analyst. After retiring active duty he taught intelligence skills for another 20 years at the Air Force Intelligence School at Goodfellow AFB, Texas. He headed up avocational archeological investigations for the Concho Valley and Iraan Archeological Societies, and worked closely with the Texas Archeological Society over the last 17 years. He published this initial book in 2019. He is currently a president of the West Texas Archeological Society and board member of the Southwest Federation of Archeological Societies.

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