LOS ANGELES AND SALT LAKE RAILROAD IN THE MOJAVE DESERT AND SOUTHWESTERN GREAT BASIN AND ASSOCIATED MINING AREAS.

Gregg Wilkerson and Larry Vredenburgh
Jan. 29, 2024

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INTRODUCTION

This report is part of a research project that describes the relationships between mines and railroads in the Mojave Desert and southwestern Great Basin of southeastern California and southwestern Nevada. t

The collection can be accessed at
http://www.greggwilkerson.com/railroads.html

Italics indicate quotations.

HISTORY

Los Angeles and Salt Lake (LA&SL) as its name indicates connected Los Angeles and Salt Lake. It did not have any specific mining district in mind as a destination when construction started, but many mine railroads later connected to it after it was built. This included the Cushenberry, Mojave Northern, Calico and Odessa, Ivanpah, Yellow Pine (Goodsprings), Blue Diamond and Six Companies railroads.

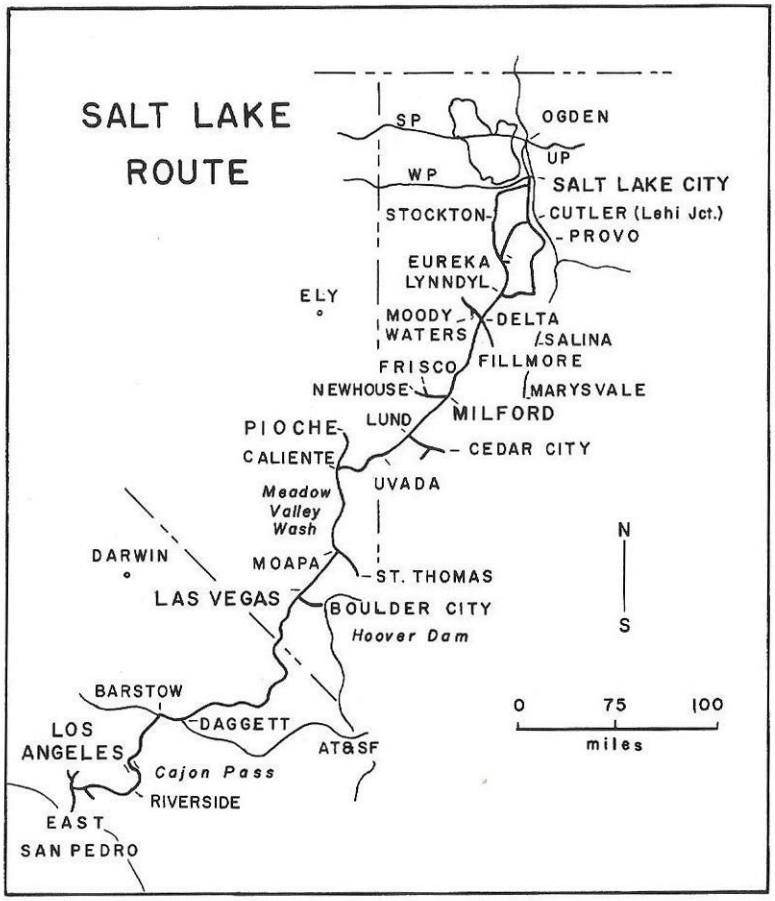
Mining districts near or serviced by the LA&SL were the Lucern-Big Bear, Oro Grande, Barstow, Calico, Borate, Cronese, Providence, New York, Ivanpah, Sunset-Crescent, Goodsprings, and Ardan.

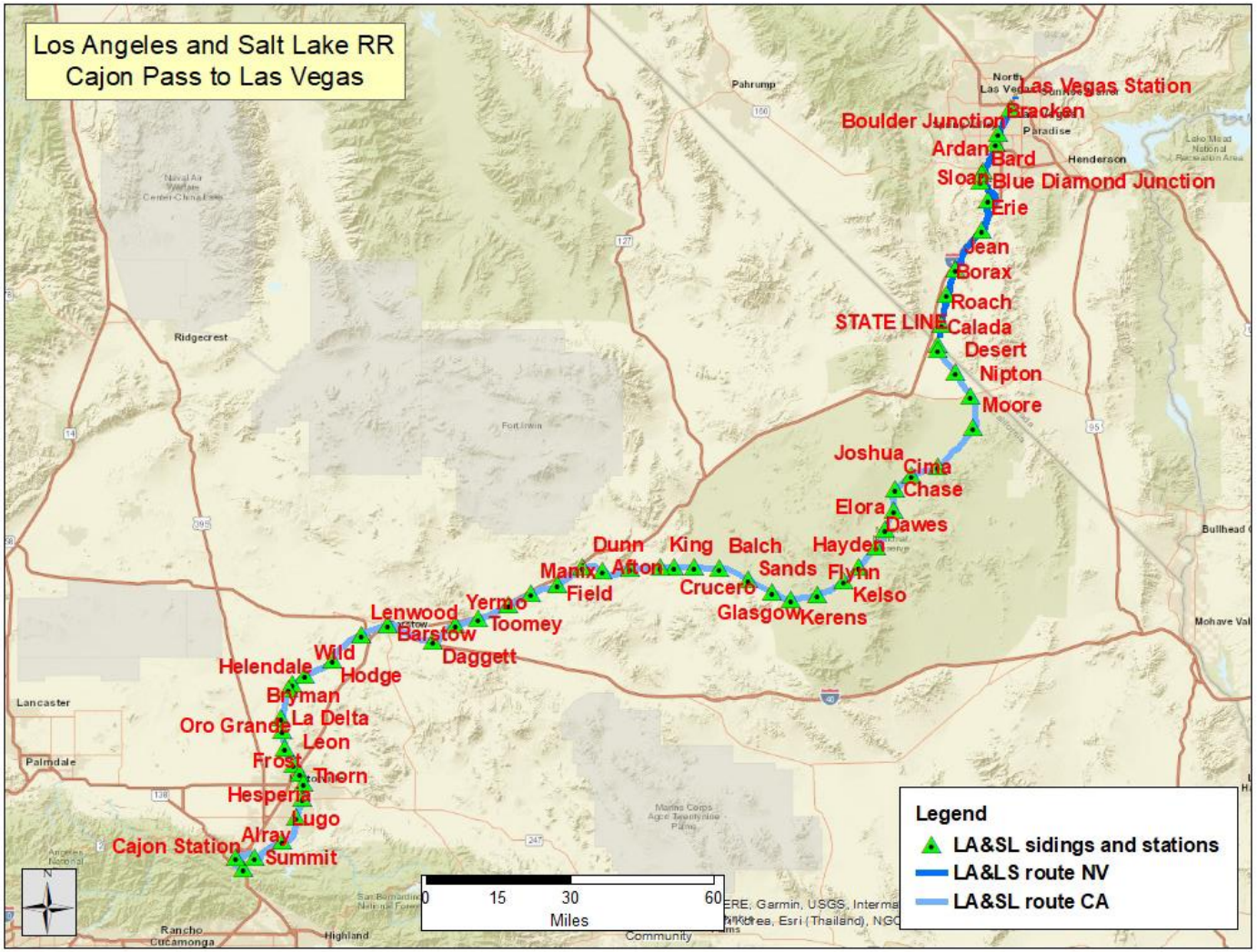
The Los Angeles and Salt Lake (LA&SL) railroad involved the competition, mergers and cooperation between several companies.

The LA&SL began surveying and constructing a subsidiary Utah Southern southwest from Salt Lake to Milford Utah. In 1888 a reorganized LA&SL built railroad grade 145 miles but only 8 miles of track from Milford to Pioche Nevada. The crash of 1893 led to a reorganization and rejuvenation of the LA&SL by Edward Henry Harriman until 1898. At this time a competitor and owner of the rich copper mines at Butte Montana, Senator William Andrews Clark, purchased the Los Angeles Terminal Railway. Clark also created the Utah and California Railroad and obtained the rights to survey a route across Utah to the Nevada state line. A compromise between Harriman and Clark on July 9. 1902 resulted in a merger. Track was laid east from Los Angeles and west from Utah. The efforts joined at an empty area of Nevada desert about 27 miles west of Las Vegas on January 30, 1905. The LA&SL later became part of the Union Pacific Railroad. (Chappel, 2005, p. 43; Myrick, 1963:623-683). The old LA&SL route is still in operation.

This report describes the Los Angeles and Salt Lake (LA&SL) railroad between Cajon Pass and Las Vegas. The LA&SL operated under 3 names:

1905-1906: San Pedro, Los Angeles & Salt Lake Railroad
1916-1988: Los Angeles & Salt Lake Railroad
1988-: Union Pacific




Los Angeles and Salt Lake RR
Cajon Pass to Las Vegas
Las Vegas Station
Bracken
Boulder Junction
Ardan
Bard
Sloan
Blue Diamond Junction
Erie
Jean
Borax
Roach
STATE LINE
Calada
Desert
Nipton
Moore
Joshua
Cima
Chase
Elora
Dawes
Dunn
King
Balch
Hayden
Manix
Afton
Sands
Flynn
Field
Crucero
Kelso
Yermo
Glasgow
Kerens
Lenwood
Toomey
Barstow
Daggett
Wild
Helendale
Hodge
Bryman
La Delta
Oro Grande
Leon
Frost
Thorn
Hesperia
Lugo
Alray
Cajon Station
Summit
Pahrump
Ridgecrest
Lancaster
Palmdale
Rancho Cucamonga
Highland
Henderson
Bullhead
Mohave Val
0 15 30 60
Miles
Legend
LA&SL sidings and stations
LA&LS route NV
LA&SL route CA

Caption: San Pedro, Los Angeles, and Salt Lake Railroad - Locomotive 60.
From https://collections.lib.utah.edu/details?id=482048 accessed Nov. 14, 2023.

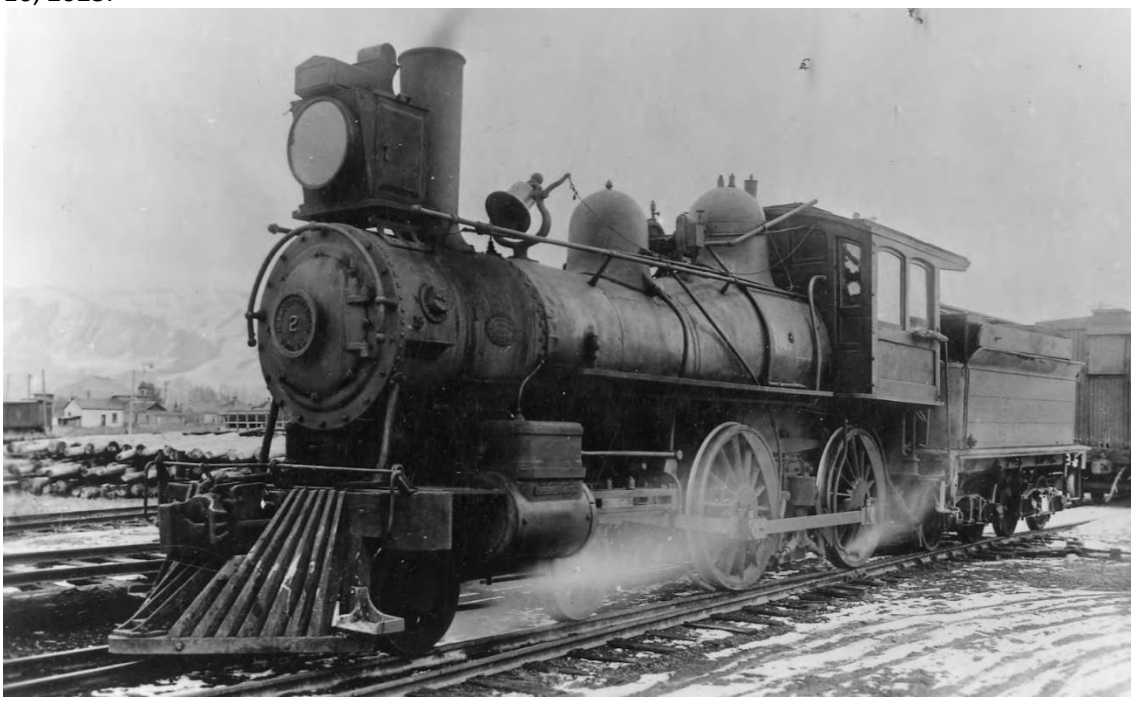
Caption: Station and engine on the LA&SL. From https://www.onlinenevada.org/articles/san-pedro-los-angeles-and-salt-lake-railroad accessed Nov. 16, 2023.

Caption: San Pedro, Los Angeles, and Salt Lake Railroad - Locomotive and Workers Close Up. From https://collections.lib.utah.edu/details?id=482050&page=4&facet_setname_s=dha_wehgn accessed Nov. 16, 2023.

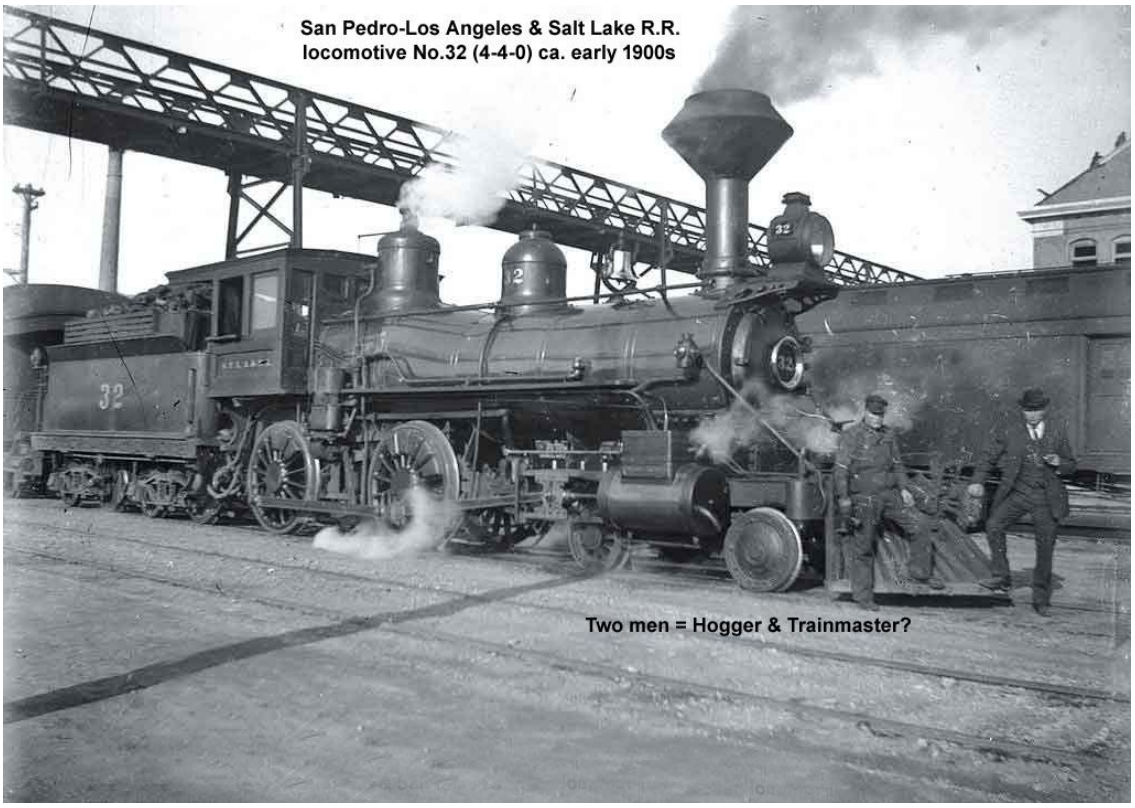
Caption: San Pedro, Los Angeles & Salt Lake RR P.2. From https://collections.lib.utah.edu/details?id=439952 accessed No. 15, 2023.

Caption: Jan. 30, 1905: The San Pedro, Los Angeles & Salt Lake Railroad, nicknamed "The Pedro," drove its last spike west of Las Vegas, providing Union Pacific with access to Los Angeles. From https://www.pinterest.com.mx/pin/237705686558950539/ accessed Nov. 15, 2023. Also scontent.xx.fbcdn.net.

Caption: Viaduct on Salt Lake Route, Near Riverside, CA. From https://aboutmytrains.blogspot.com/2014/04/tomorrow-april-27th-in-train-and-post.html accessed Nov. 16, 2023.



Caption: Salt Lake & Los Angeles Railroad P.2, From https://collections.lib.utah.edu/details?id=439894 accessed Nov. 16, 2023.



Caption: SP, LS &LV locomotive circa 1900. From https://railrelicstoday.com/Q-S.html accessed Nov. 15, 2023.

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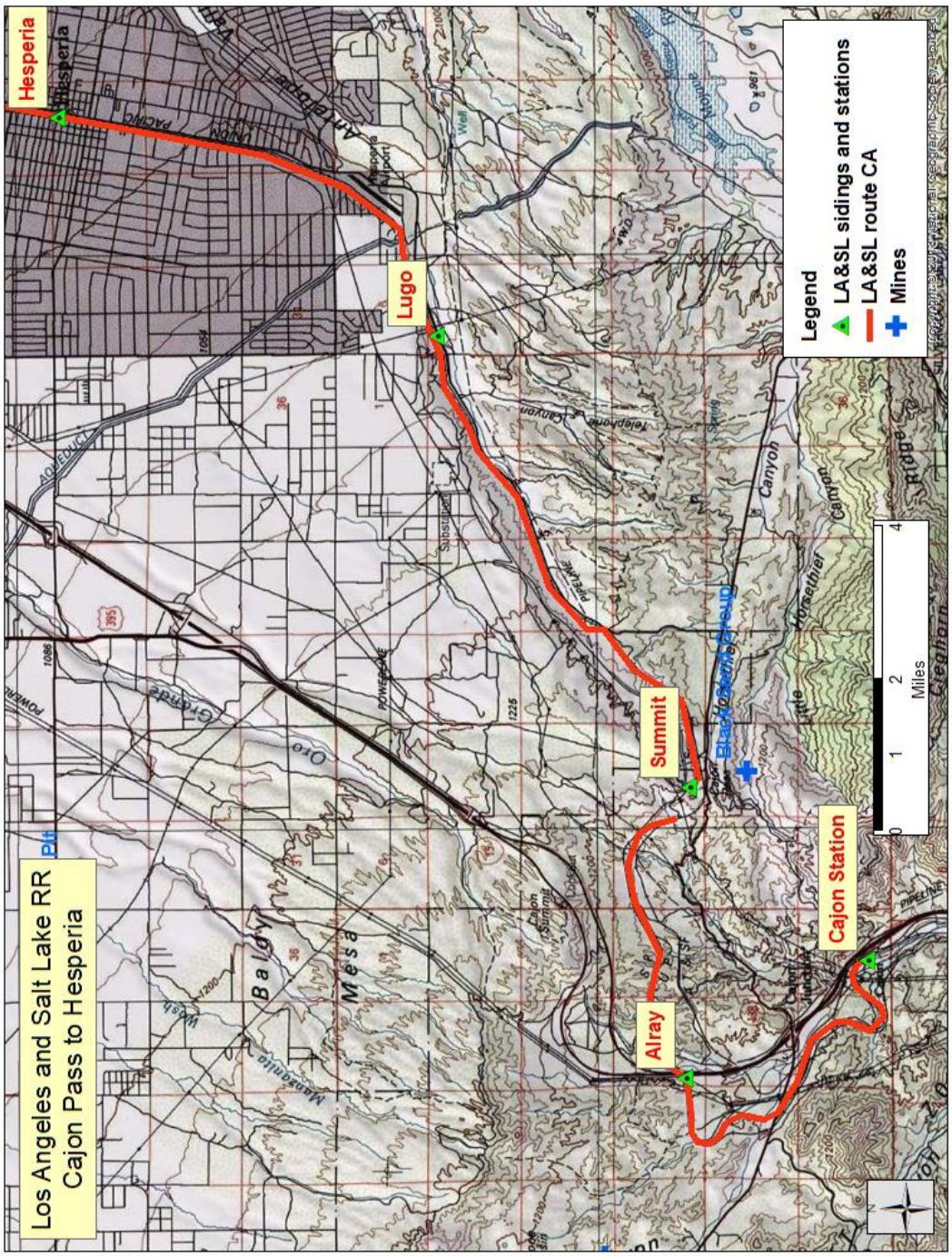
ROUTE DESCRIPTIONS

For this report, the Mojave Desert portion of the LA&SL railroad will be described from Cajon Pass to Las Vegas:

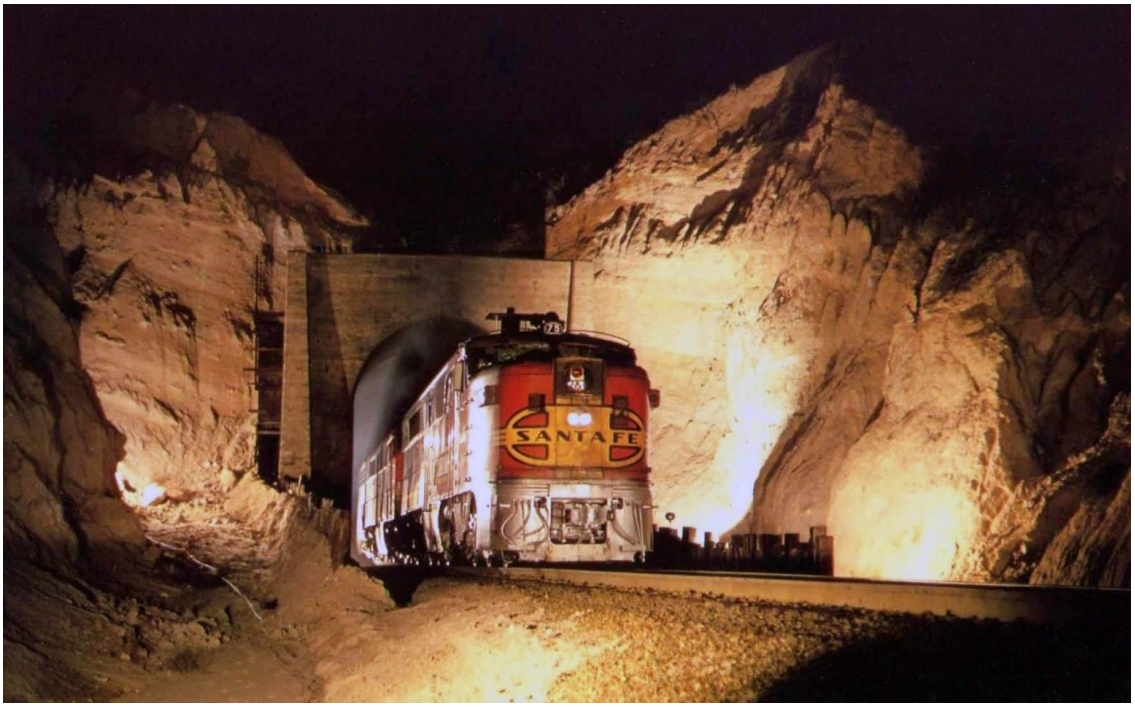
Cajon Pass to Barstow

The Cajon Station near the Cajon Pass is two miles north of the San Andreas Fault in the valley between the San Gabriel Mountains to the west and the Cleghorn Ridge to the east. There are three railroad lines in the Cajon Pass today. Two of them are on the north side of the Antelope Valley and one on the south.

From **Cajo Station**, the LA&SL went along the north side of the Pass and north to **Alray.** After Alray, it went east-northeast to **Summit** at the confluence of Antelope Valley and Summit Valley (Horsethief Canyon). Near Summit is the Black Sand Group gold mine (Wright and others, 1953, Gold Table, p. 3) and the Red Fox mercury mine (Holmes, 1965). North of Cajon Station the Antelope Valley Railroad parallels the LA&SL (Burns, 2023)


Los Angeles and Salt Lake RR
Cajon Pass to Hesperia
Hesperia
Lugo
Summit
Alray
Cajon Station
Legend
LA&SL sidings and stations
LA&SL route CA
Mines
0
1
2
4
Miles

Caption: A long parade of Santa Fe GP30's, led by #1234, have an eastbound climbing the 2.2% grade around Sullivan's Curve at Cajon Rocks during the late 1960s. American-Rails.com collection. https://www.american-rails.com/cajon.html accessed Nov. 13, 2023.



Caption: At around 2:30 a.m. on the morning of February 27, 1967, Santa Fe's train #8, the eastbound "Fast Mail Express," exits from one of the two tunnels (since daylighted) on Cajon Pass. The train had

departed Los Angeles at around Midnight. William Mills photo. https://www.american-rails.com/cajon.html accessed Nov. 13, 2012.

Caption: Santa Fe GP35 #3454 and several other EMD's lead a string of empty hoppers eastbound over the summit of Cajon Pass in 1979. Mike Bledsoe photo. American-Rails.com collection. https://www.american-rails.com/cajon.html accessed Nov. 13, 2023.

From **Summit** the LA&SL went 3 miles east to a point where the Antelope Valley railroad veers off to the north. The UP continues east to Lugo and then north to **Hesperia**. **At Hesperia**, a branch of the BNSF goes east to the Cushenbury Limestone Quarry (Wright and others, 1953:174). This line was near many mines in the north-central part of the San Bernardino mountains. This line is described in Part III of this report

Caption: This Santa Fe publicity photo, a set of classic F units, led by F7A #252-C, climb the 2.25% grade over the newer alignment near the summit of Cajon Pass in April, 1964. Adam Burn's collection. https://www.american-rails.com/cajon.html accessed Nov. 13, 2023.

Caption: A pair of handsome Santa Fe PA-1's have a railfan special at the summit of Cajon Pass in early 1964. Roy Gabriel photo. Adam Burns collection. From https://www.american-rails.com/cajon.html accessed Nov. 13, 2023,

From Hesperia, the LA&SL went north to **Thorn**, past **Spring Valley Lake** (to the east), to **Victorville.**

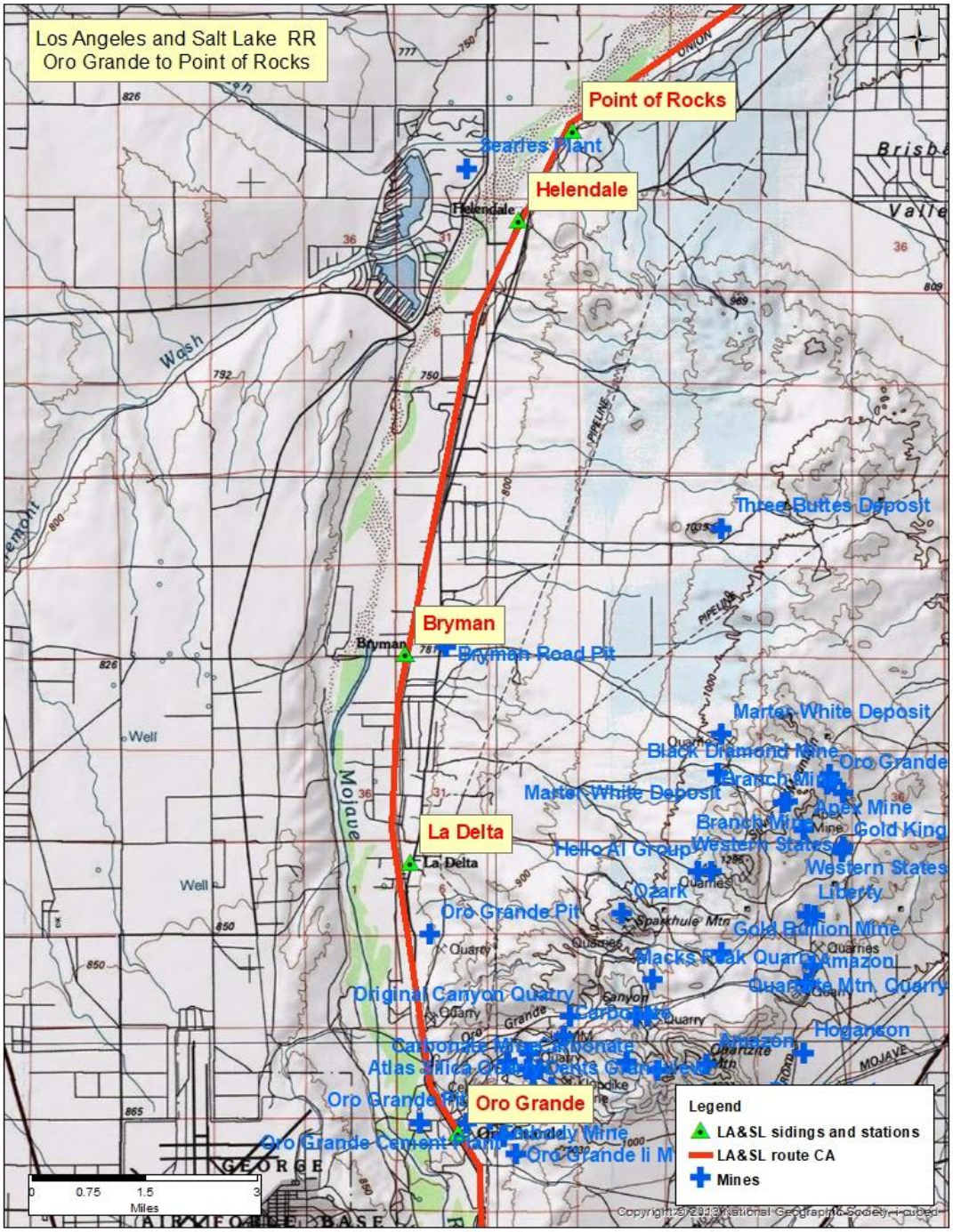
Northeast of **Victorville** are a number of granite and limestone quarries that were near the LA&SL railroad. These included the Concha, Corona Granite, Eureka, Feldspar, H and P Limestone, St John Granite, Victor Granite and Victorite Quarry see Wright and others, 1953:140; Southern Pacific, 1964:73. Eric, 1954:302; Rapp and others, 1981:49)

From **Victorville**, the LA&SL went northwest to **Mojave Heights** where there is a spur line going west and then northwest to **George Air Force Base**.

From **George Airforce Base Junction**, the Sidewinder Railroad went 1.7 miles south to Leon then 15.3 miles east to the Sidewinder mines between the eastern slope of the Black Mountain and the west end of the Sidewinder mountains (Wright and others, 1953, Deposit no 181, p. 57). The Sidewinder Railroad is described in Part III of this report

From **Mojave Heights**, the LA&SL went north to **Oro Grande**. At Ore Grande there are several quartzite quarries, as well as mines producing sandstone, granite, limestone, gold, copper, gold, lead/silver, and silica. The gold mines were active during the 1880's, early 1900's and again in the 1930's. Large amounts of cement are produced here now. Major mines include the Apex, Branch, Carbonate, Dents Grandview Lode, Gold Bullion, Gold King, Oro Grande I and II, Sidewinder & Western States. (Minedat, 2023e; Southern Pacific, 1964:47, 49; Goodwin, 1957:610; Wright and others, 1954:27, 34; 36, 52, 125, 128; Bowen, 1954:125, 129-131).

From **Oro Grande**, the LA&SL went north to **La Delta, Bryman** and then **Helendale** along the Mojave River.



From **Helendale**, the LA&SL went northeast along the south bank of the Mojave River to **Point of Rocks**.

From Point of Rocks, the LA&SL went northeast to **Hodge** along the Mojave River. At **Hodge,** 2 miles to the west-northwest are a group of mines including the Golconda Asbestos, Golconda Clay, Hodge Stone, Alas Fire Brick. Millet Clay and Kennedy Silica. These mines are described by Wright and others,

1953:155, 167; Aubury, 1906:263; Tucker and Sampson, 1943: 508, 511; Bowen, 1954:151-152; and Rapp and others, 1981:48.

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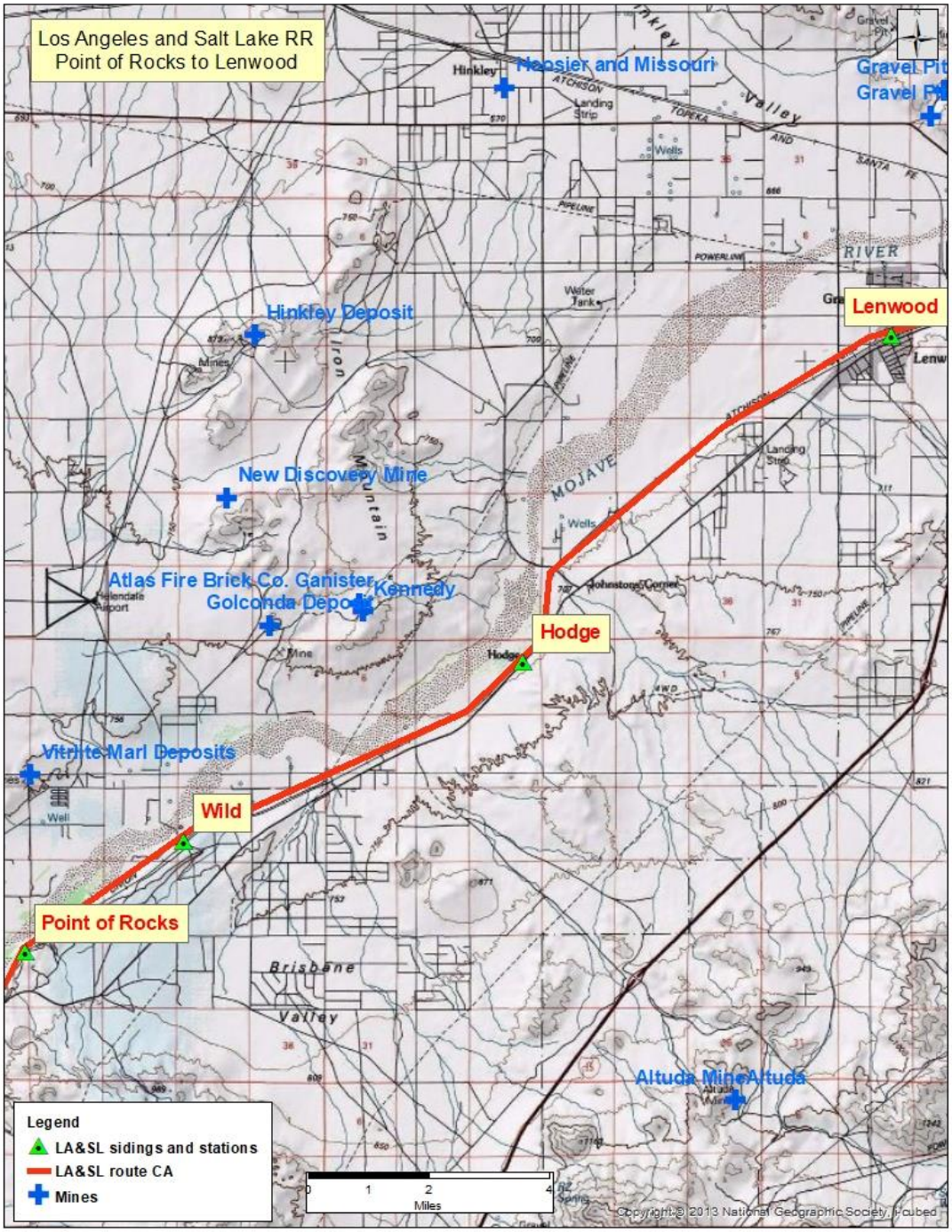
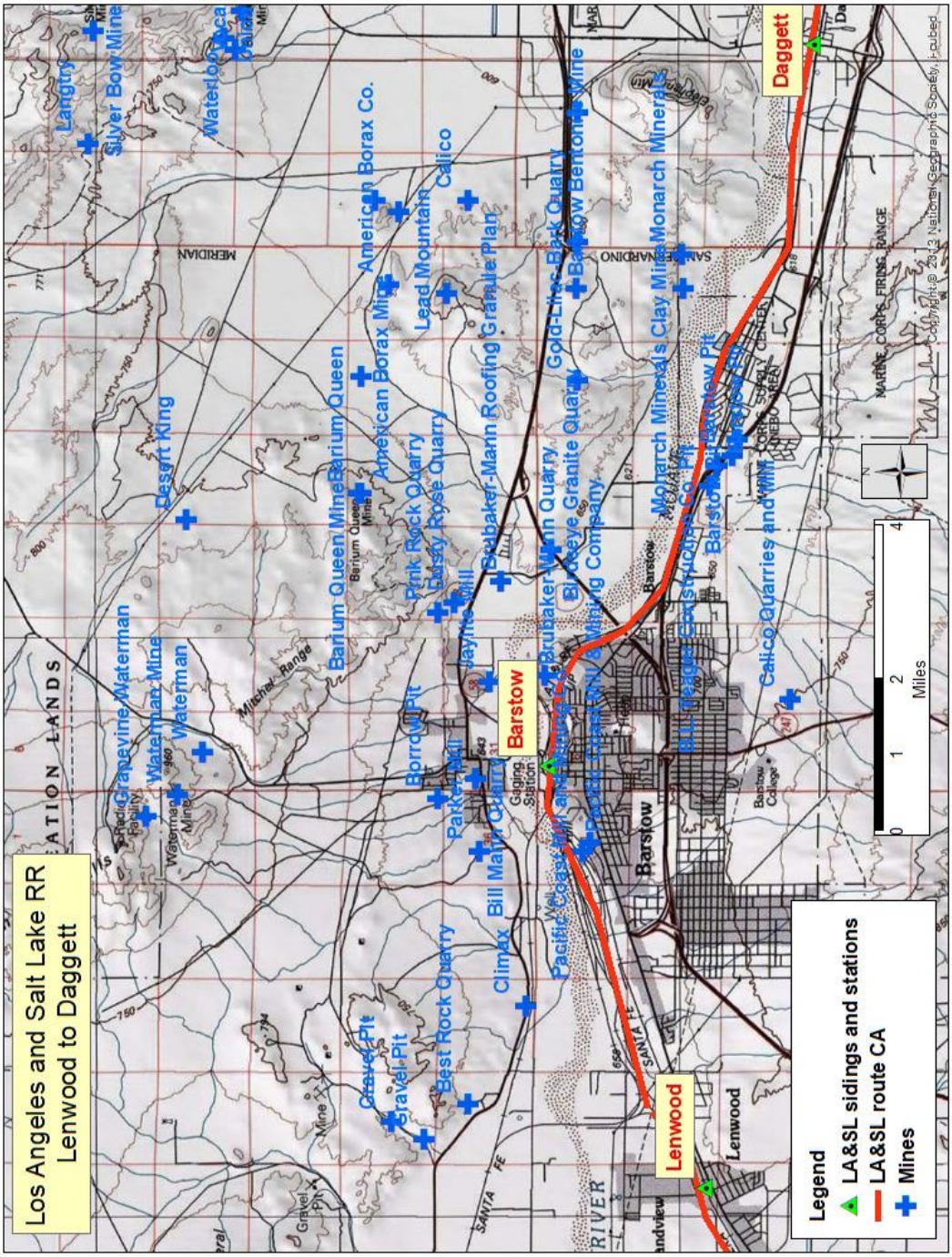
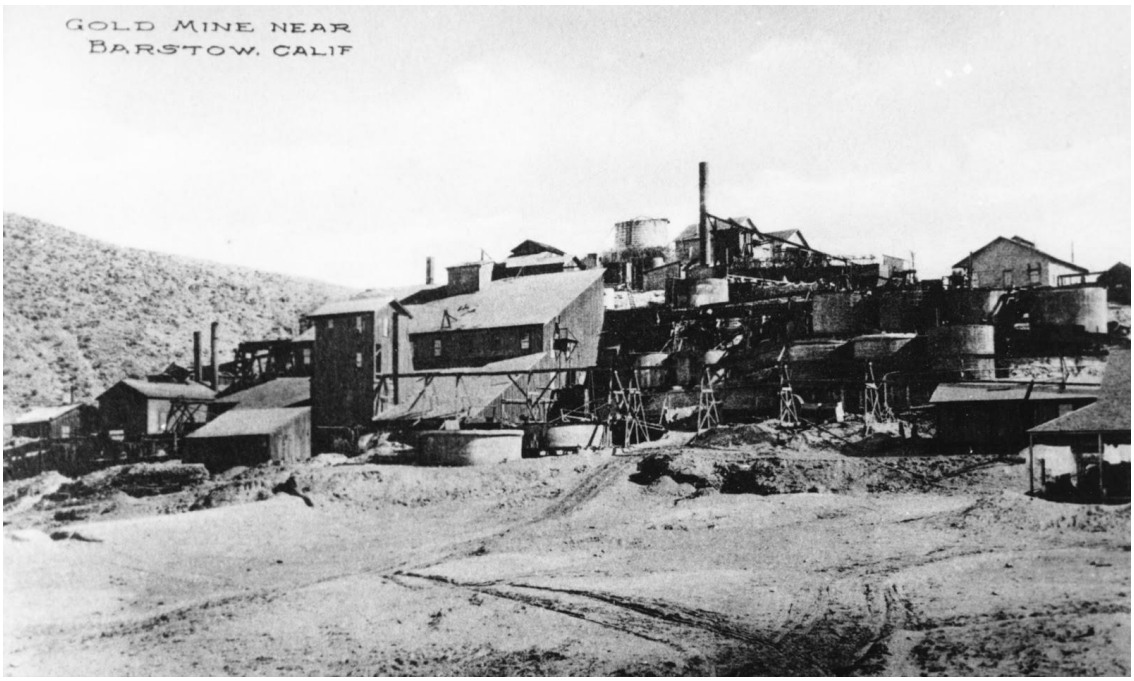
From **Hodge**, the LA&SL went west to **Johnson's Corner, Lenwood** and **Barstow.**





Barstow to Kelso

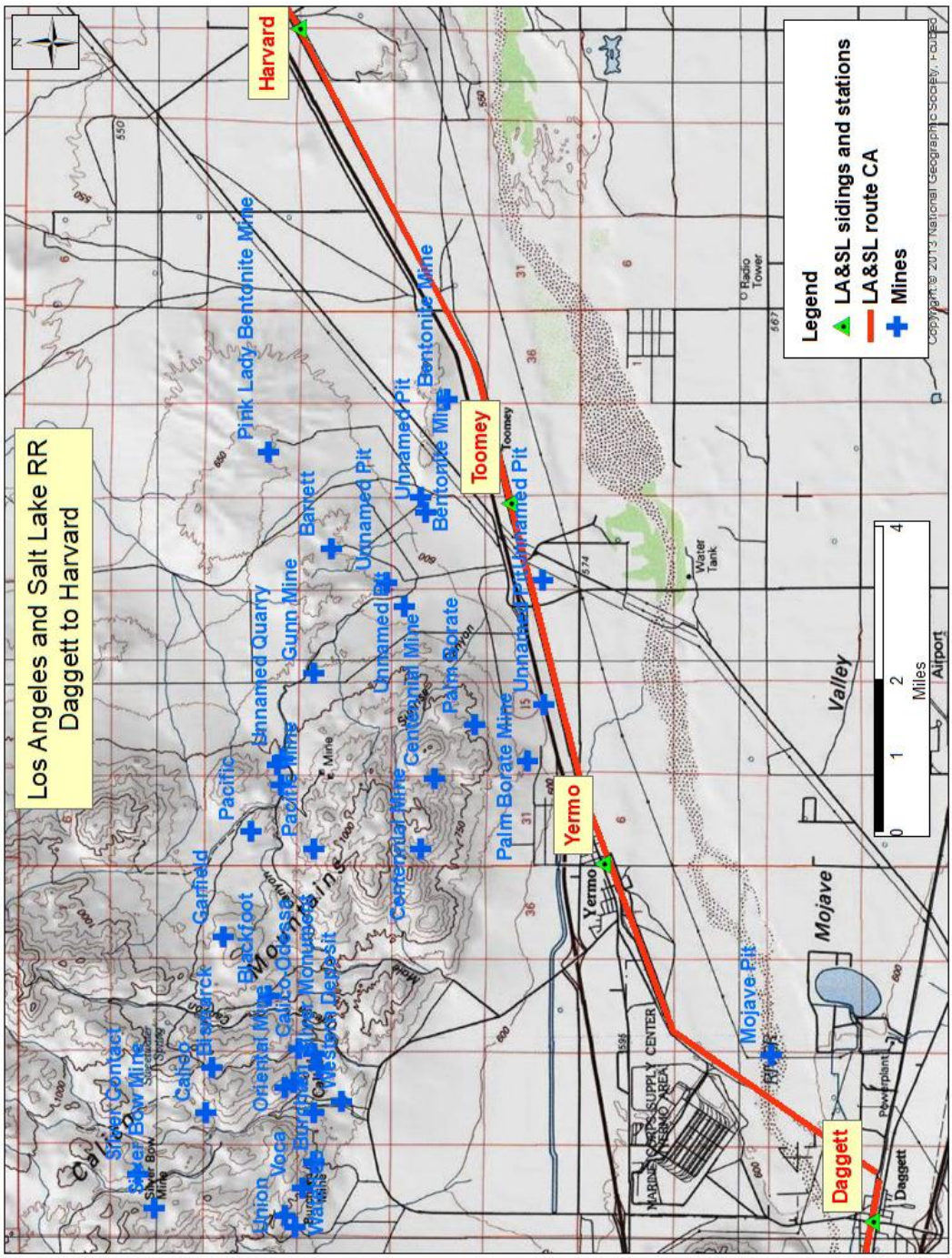
Barstow had a mill on the north side of town that processed ores from the Bagdad-Chase copper mine south of Ludlow (Wilkerson 2020e, Nop, 2023).



Caption: Baghdad-Chase (Stedman) Mill at Barstow. From O.A. Russel Collection No 859a.

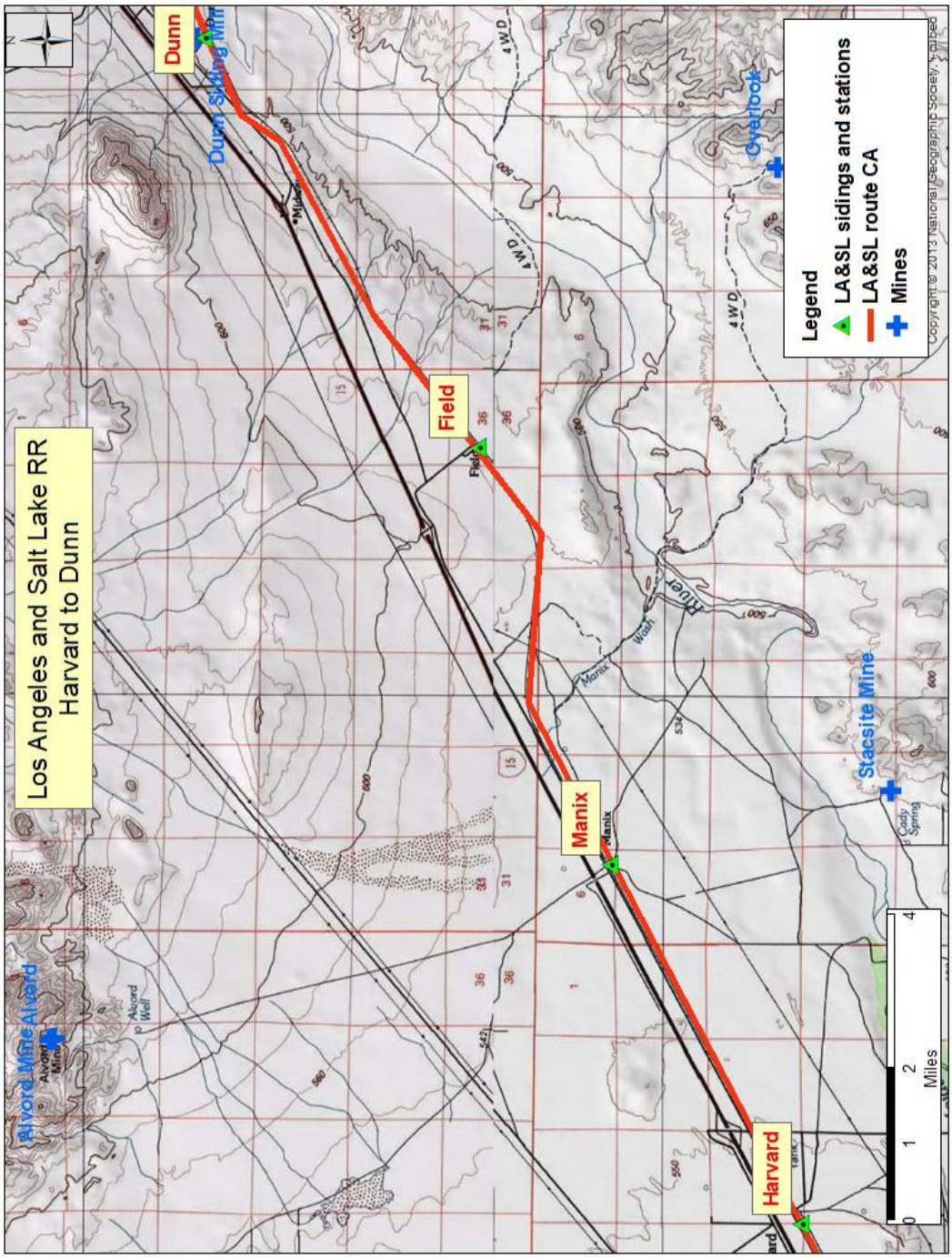
From Barstow the LA&SL followed the route of the APS to **Daggett.** There spur lines connected north and northwest from Daggett to the silver mines of Calico and the borate evaporite deposits of Borate (Wilkerson 2022a). A description of these short lines is given in Part III of this report.

From **Daggett**, the LA&SL went northeast to **Yermo**, then northeast to **Toomey, Harvard** and **Manix** sidings.



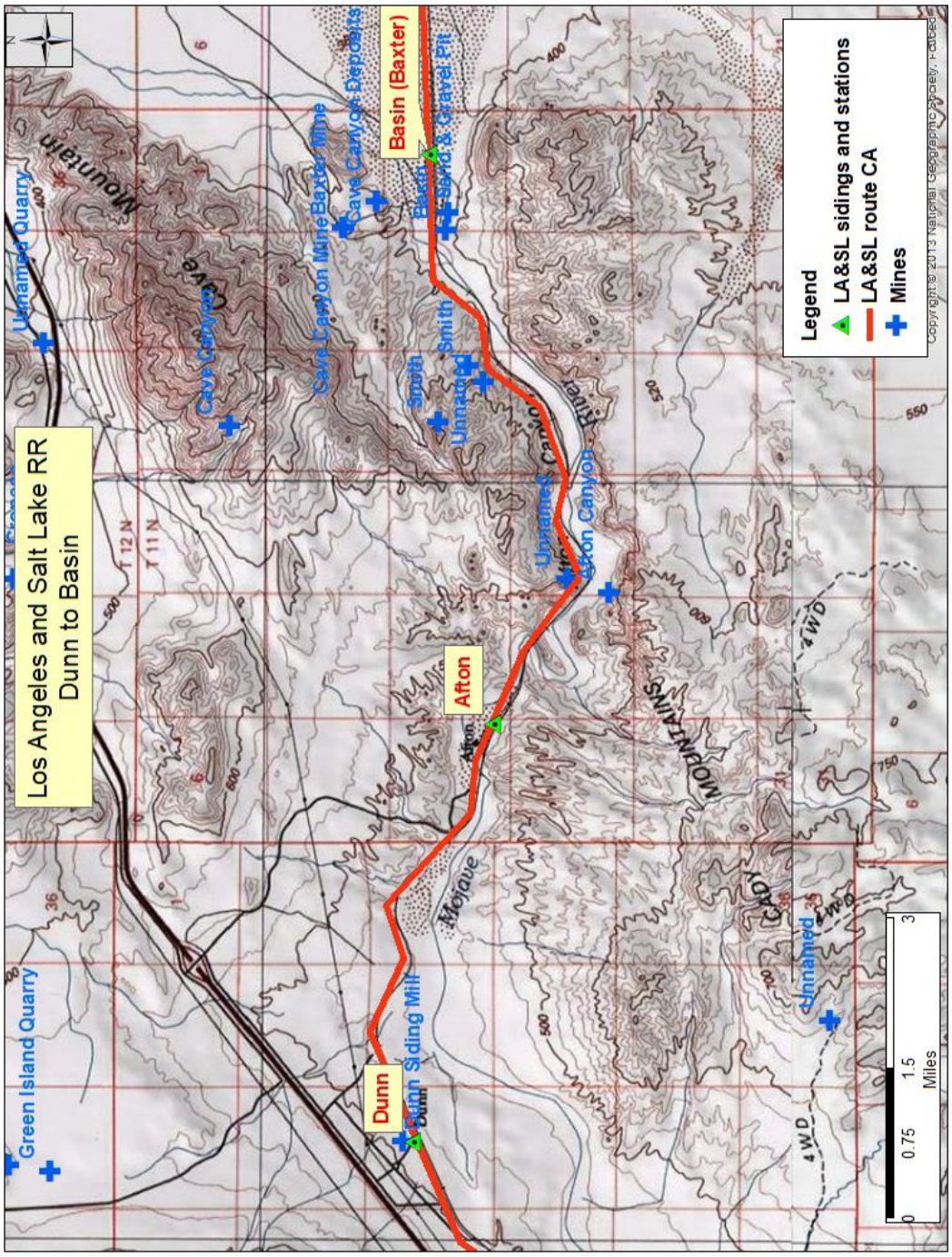
From **Manix,** the LA&SL went east to **Field** and then **Dunn siding**. Dunn siding is the location the Dunn mill and storage silos. There were two of them. The **Dunn Siding Mill** is about 30 miles east of Barstow on the LA&SL Railroad. The mill had been an important processing and shipping facility for borates, talc, and other industrial minerals for nearly 80 years circa 1920-2000. In 1990 the operator, American Borate Company, processed its Death Valley borate at this plant, and also performed custom grinding for independent industrial mineral mining companies. Custom mills like this one are as important to

independent mineral producers as cooperative grain mills are to independent wheat farmers. (Rapp and others, 1990, p. vii).

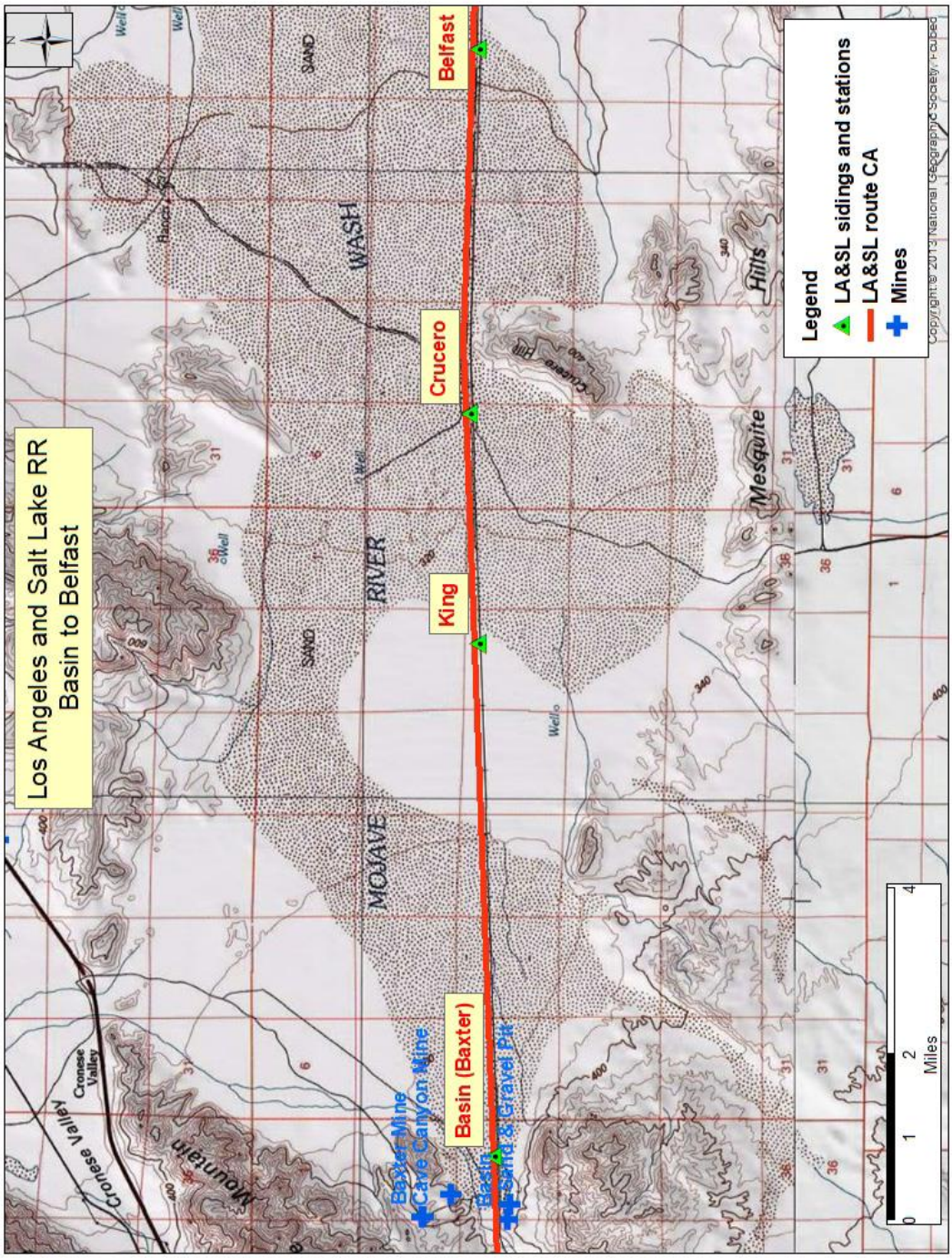


From **Dunn**, the LA&SL followed the Mojave River in Afton Canyon past the present day **Afton Campground** to **Afton siding**. At one time, the Afton Canyon Manganese mine had a tramway that took

ores from the top of the canyon near-vertical wall down to the railroad (Wilkerson, 2019a; Wright and others, 1953:159).



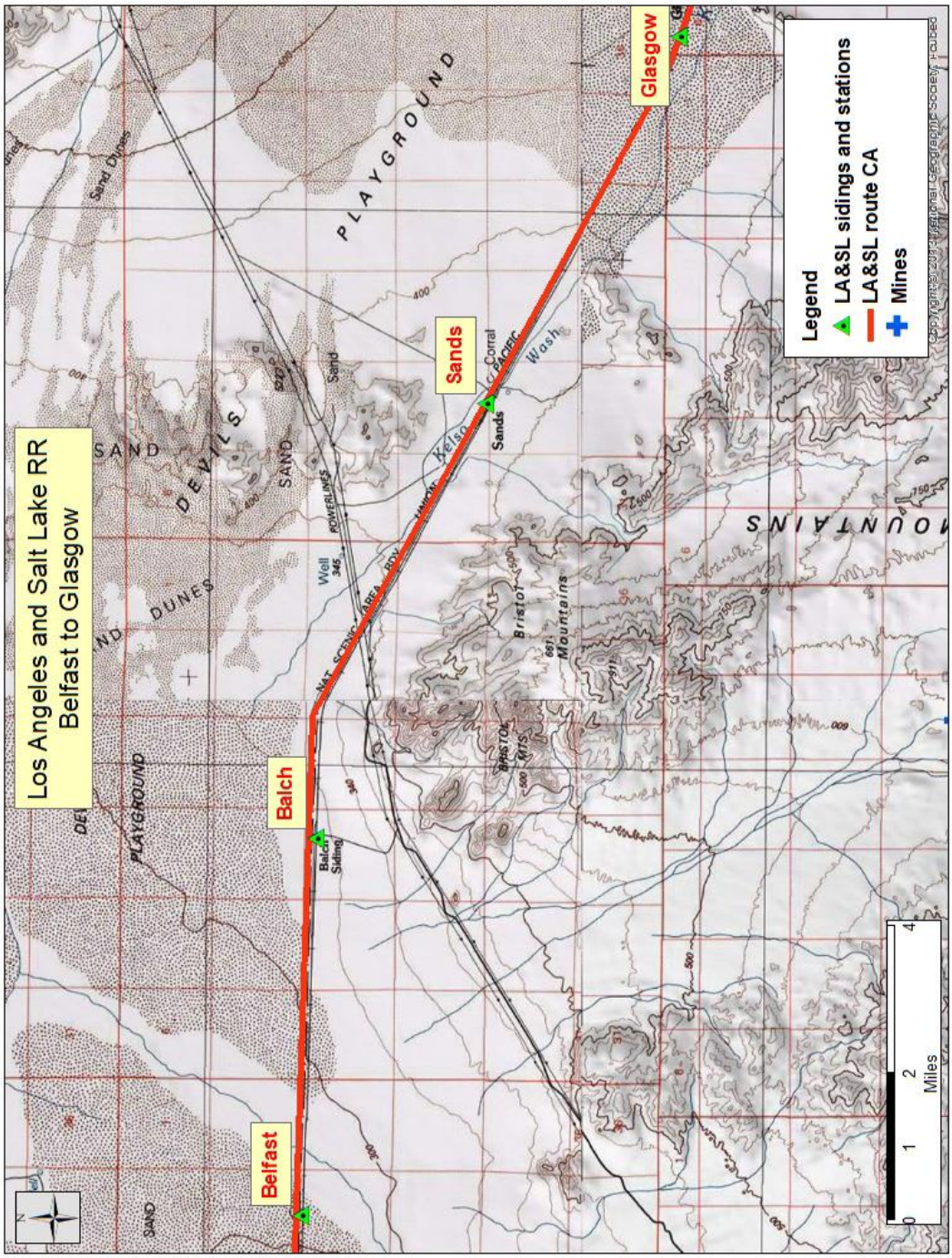
Eastward from the Afton Canyon Mine, the LA&SL arrives at **Basin**. This siding was a ore shipping point for iron and limestone ores at the Baxter and Cave Canyon Mines (Wilkerson, 2023; Vredenburgh and Wilkerson, 2023; Brown and Monroe; 2000). The Basin Railroad is described in Part III of this report.



Proceeding eastward from **Basin**, at the north side of Crucero Hill is the **Crucero** siding. This is the junction of the LA&SL with the Tonopah-Tidewater railroad.

Eastward of **Crucero**, the LA&SL passed Crucero Hill to the south and follows a levee to **Balch** siding, south of Devil's Playground on the south side of Soda Lake. From **Balch**, the LA&SL curved to the

southeast, following Kelso Wash, around the north end of Bristol Mountains (Wilkerson, 2017b) to **Sands** siding at Kelso Wash. The LA&SL then followed Kelso wash southeastward to **Glasgow** siding in the Devils Playground sand dunes.

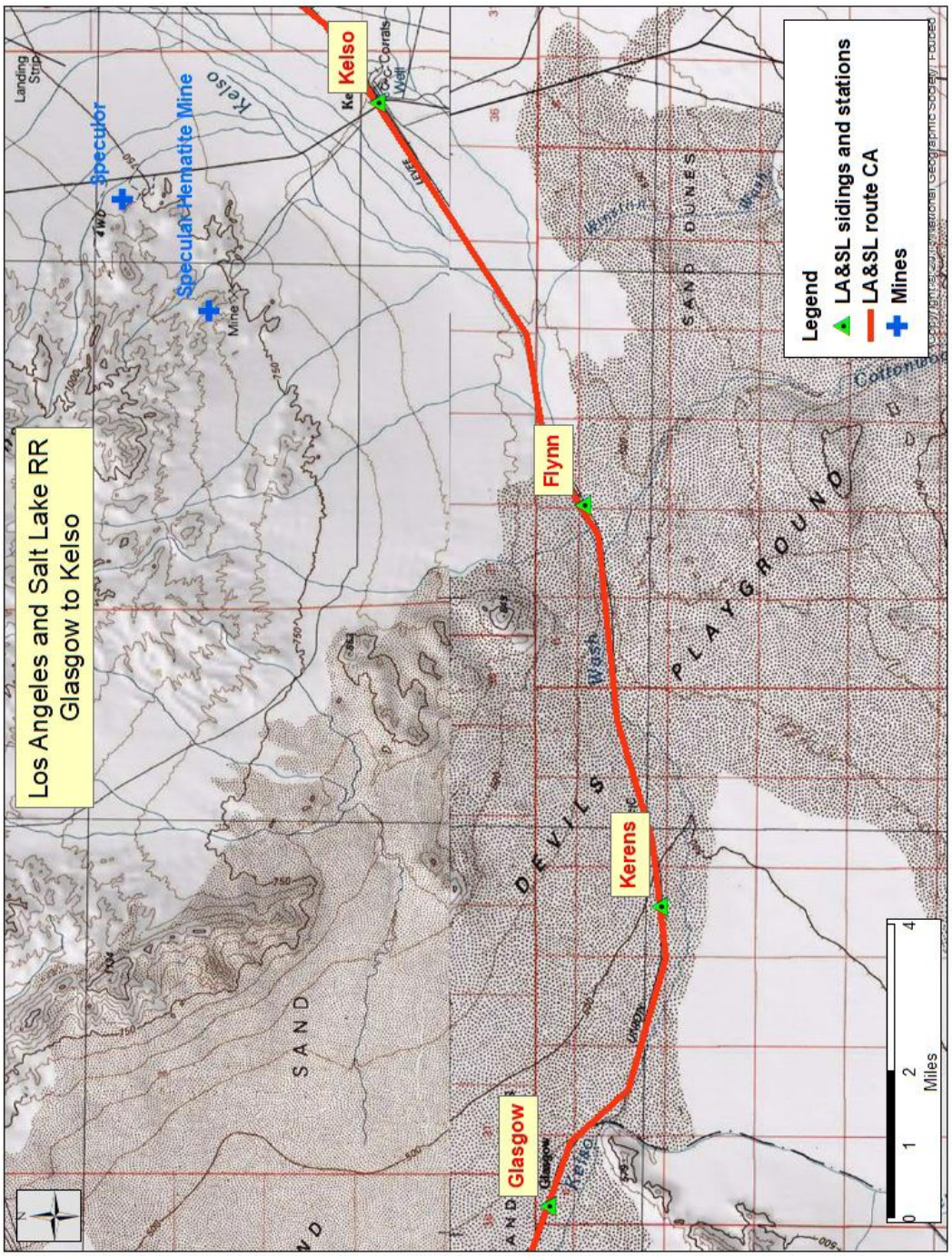


From **Glasgow** the LA&SL passed the northeast tip of the Bristol Mountains and went east to **Kerens** siding and then **Flynn** near the northeast edge of Devil's Playground at Kelso Wash. From **Flynn**, the

LA&SL went northeast to **Kelso Station** between the Providence Mountains to the southeast and the Kelso Mountains to the northwest.

Caption: Kelso Depot. From https://www.flickr.com/photos/courthouselover/16402178116 accessed Jan. 14, 2023.

This depot opened in 1905 and served as a helper station to pull trains over Kessler (later renamed Cima) summit.



Kelso to Jean Siding

After **Kelso**, the eastward sequence of sidings was **Hayden**, **Elora, Chase** and **Cima**. The Cima siding , between Cima Dome and the Mud Hills, was near the Death Valley Mine (Wright and others, 1953; Hewett, 1953:106-107; Goodwin, 1957:627; USBOM, 1990, Hewett, 1956:133). The LA&SL passed through the eastern part of the Providence Mountains Mining District.

The Providence Mountains has several hundred mines many of which were near the LA&SL (Wilkerson, 2023xx). They are described by the following papers and reports:

Goldfarb and others, 1988 (N. Providence Mnts)
Hazzard, 1954 (Cambrian Providence Mnts)
Hewett, 1956 (Ivanpah Quad)
Landwehr, 1932 (Ore Control)
Miller and others, 1984 (S Providence Mnts)
Miller and others, 1985 (S Providence Mnts)
Miller and Wooden, 1994 (Proterozoic Providence Mnts)
Moyle and others, 1986 (Providence Mnts WSA)
Thompson, 1928 (Mojave Desert Water)

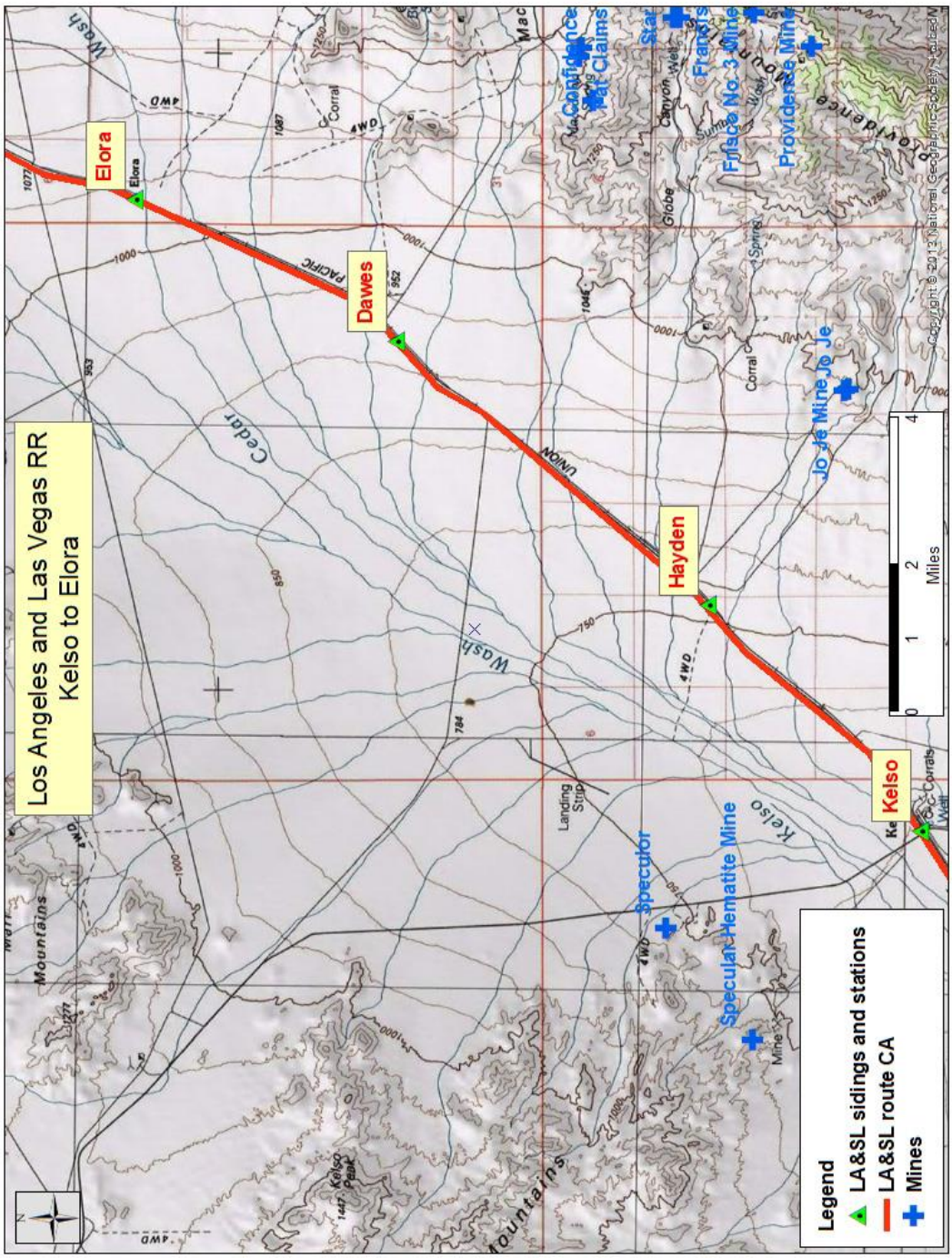
Principle mines of the northern Providence Mountains were the

Black Jack mine
Bonanza King mine
Castor-Pollux mine (Columbia mine, Macedonia mine)
Cornfield Springs Consolidated mine
Dixie No. 2 prospect
Double H Nos. 1 and 2 mine
Fan 1-5 prospect
Francis mine
Frisco No.3 mine
Globe mine
Gold Star North 1-44 and Gold Star 1-10 prospects
Good Hope mine
Grande 1-7 mine
Green Scorpion prospect
Jo Je mine
Max Dor 1 and 2 mine
Okaw mine
Pink Jack prospect
Prospect
Providence mine
Rex mine
Silver King mine (Perseverance mine)
SS No. 28 prospect, north
SS No. 29 prospect, north
SS Nos. 20-22, 27-29 mine, south (Star [?] mine)
Tough Nut mine
Vulcan mine-Burro prospect

Principle mines of the southern Providence Mountains were:

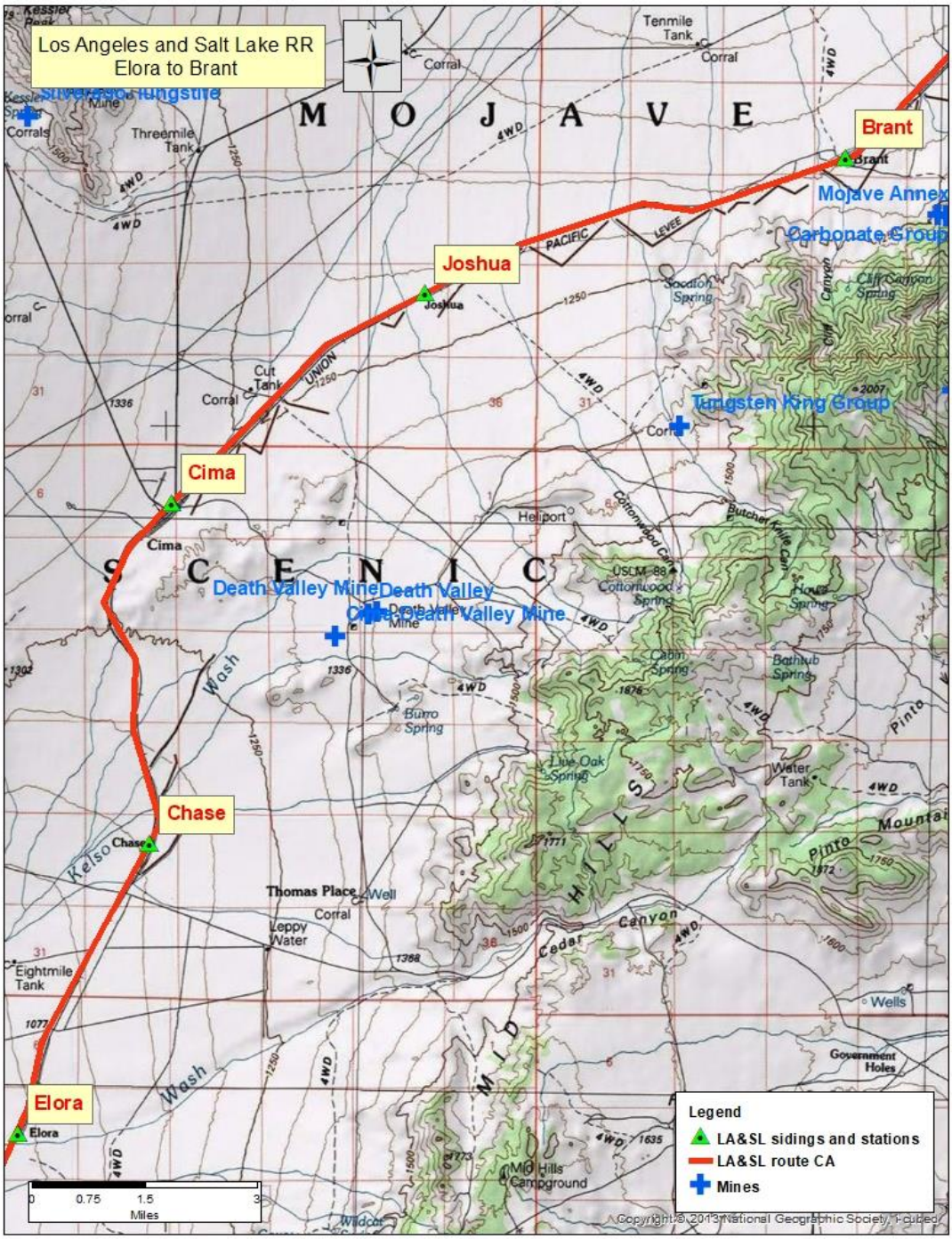
Adams-Anna
Bighorn

Blue Danube
Buena Vista
Crystal
Echo
Foshay Pass Barite
Gold Cross
Golden Gift
Golden Nugget
Goldstone Group
Hayman
Hidden Hill
Iron King
Lady Luck
Lauri
Long Chance
Midas Touch
Midnight Group
Pennsylvania
Philadelphia Fluorspar
Pilot
Providence
Santa Anna
Sunview
Texas
Warm Springs
Wild Ass
Wild Cat


Los Angeles and Las Vegas RR
Kelso to Elora
Elora
Dawes
Hayden
Kelso
Specular Hematite Mine
Specular
Jo Je Mine Jo Je
Legend
LA&SL sidings and stations
LA&SL route CA
Mines
Miles

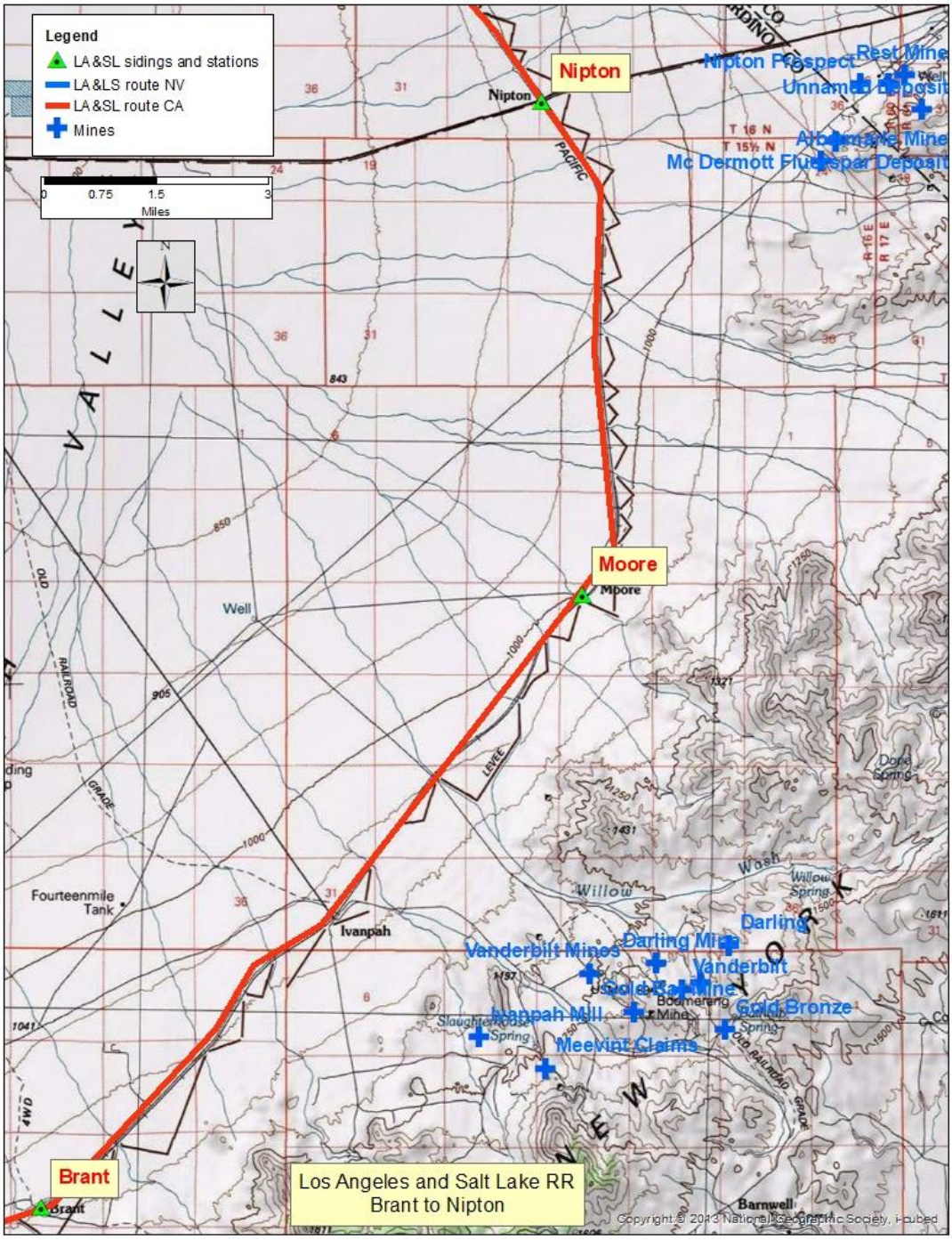
Caption: View of L.A. limited going east to Salt Lake at Cima. From the Bowker Collection #1. Also from the Larry Vredenburgh Collection.

From **Cima**, the LA&SL went northeast to **Joshua** and then west to **Brant.**



Brom **Brant**, the LA&SL went northeast to **Ivanpah Junction**. These sidings were near mines in the Ivanpah and New York Mountains . The Ivanpah Railroad and northern end of the California Eastern Railroad met at Second Ivanpah south of Ivanpah mining camp (called Ivanpah I). This junction was also called Ivanpah II. The major mines of the Ivanpah mountains were the Morning Star, Carbonate King, Standard, Koroweef and Allured mines (Hewett, 1956; Goodwin, 1957:672; Wright and others, 1953: 61, 103-106, Hewett, 1956:155; Murdoch and Webb, 1966; USBOM, 1990, Joseph, 1985, Tucker and Sampson, 1943:61, Tengelsen, 2023). The Mastodon, Vanderbilt, and Boomerang Mines in the New York

Mountains were also near the California Eastern Railroad (USBOM, 1990:116; Joseph, 1985; Wright and others, 1953, Vredenburgh and Wilkerson, 2023).



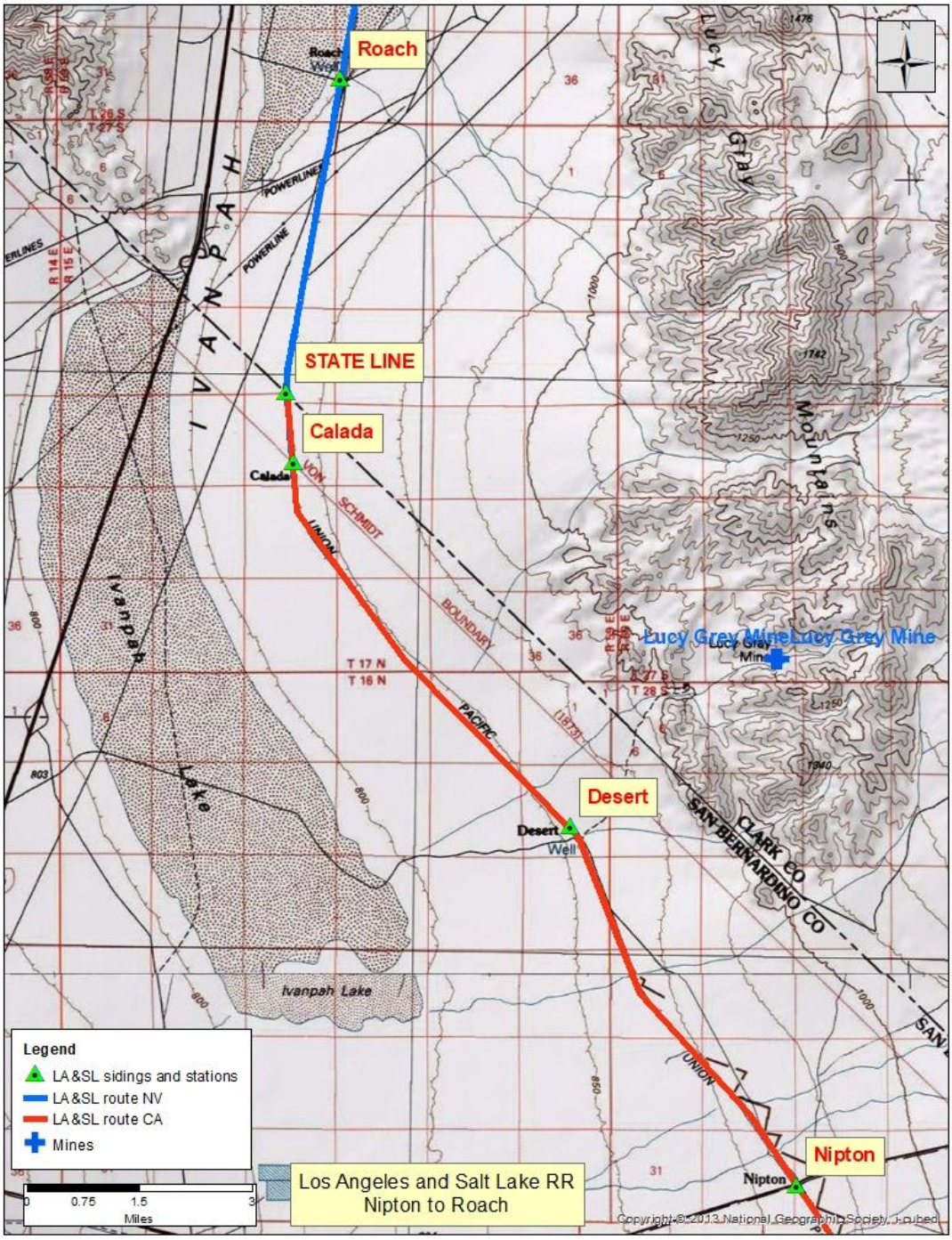
From Ivanpah II, the LA&SL went northeast to **Moore** and the west flank of the New York Mountains, then north to **Nipton**. The **Nipton** siding is at west of the southern end of the Lucy Gray Mountains of the McCulloch Range and the northern end of the Castle Peaks of the New York Mountains. Nipton was

near the Crescent Mining District (Spur, 1906). Major mines were the Lucy Gray, Silver Bell, and Nipperio (Hewett, 1956:128: Longwell and others, 1965:62, USBOM, 1937:81; Garside, 1979).

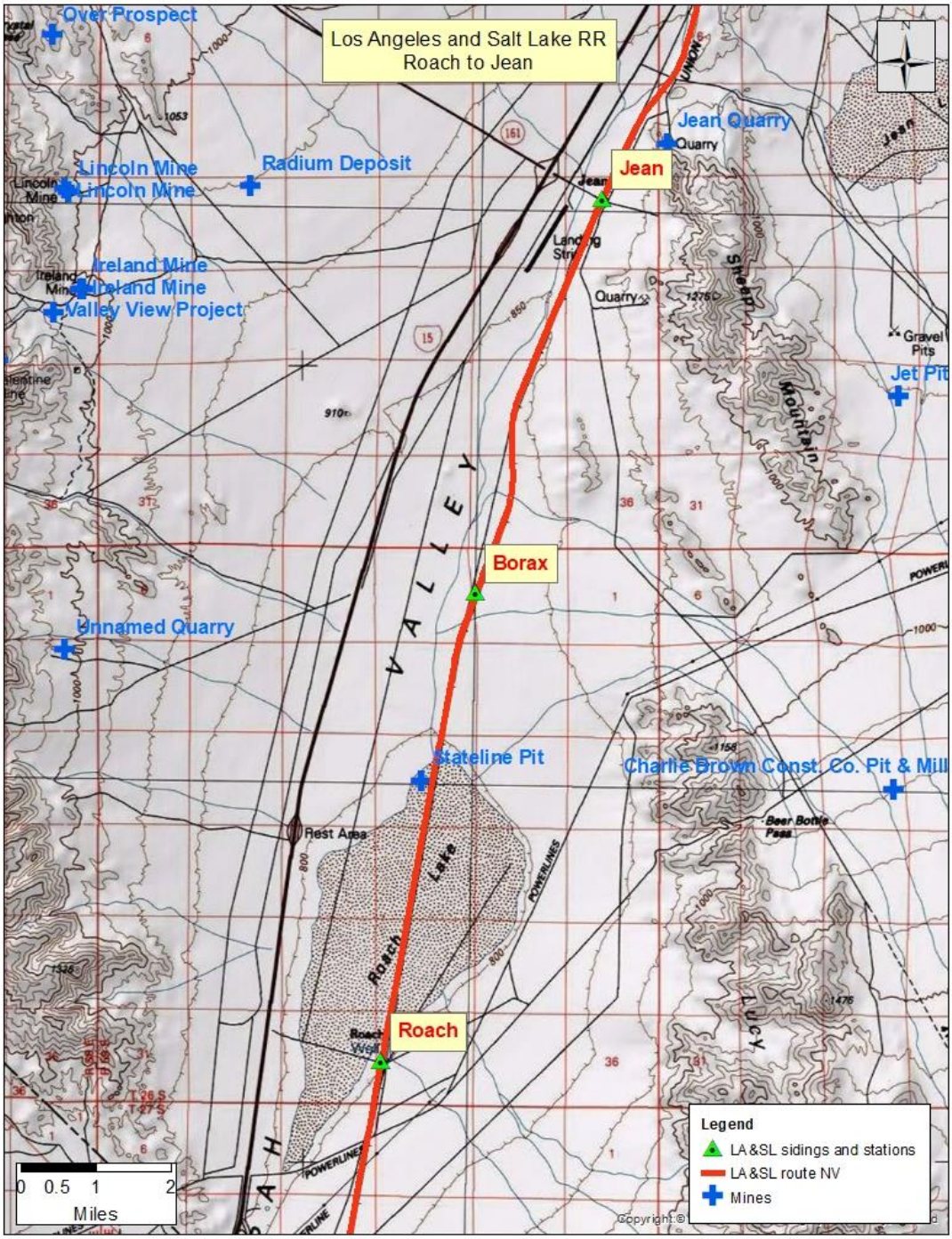
Caption: Nipton Train Station, undated. From https://www.danheller.com/images/FAQ/Tech/Travel/img3.html accessed Nov. 13, 2023.

Caption: Nipton Siding, undated. From http://www.trainweb.org/brettrw/uprr/cimasub/mownipton.jpg accessed Nov. 13, 2023.

From **Nipton,** the LA&SL went northwest between Ivanpah Lake and the Lucy Grey Mountains to **Desert** and then **Calada** siding. Desert was near the Lucky Gray Mine and the Desert Feldspar Mine (Longwell and others, 1965:204, Minobras, 1973:9). North of Calada, the LA&SL crossed the **state line** into Nevada.



The first Nevada siding was **Roach** on the southwest side of Roach Lake. From there the LA&SL went north across the lake to **Borax** siding, thence north to **Jean** on the north end of sheep Mountain.



Jean station was the junction with the Yellow Pine Mine (Goodsprings Mining District) railroad and was near the mines of the southern Spring Mountains and the town of Goodsprings (Wilkerson, 2018a, Myrick, 1963:753-759). A description of the Yellow Pine is found in Part III of this report. The Suto District

was north of Jean. It had Sand and Gravel, Limestone (Jean Mines) an a zinc mine (Suprise Mine)(NDM, 1981; 1982, Murphy, 1954:4; Longwell and others, 1965:197, 209

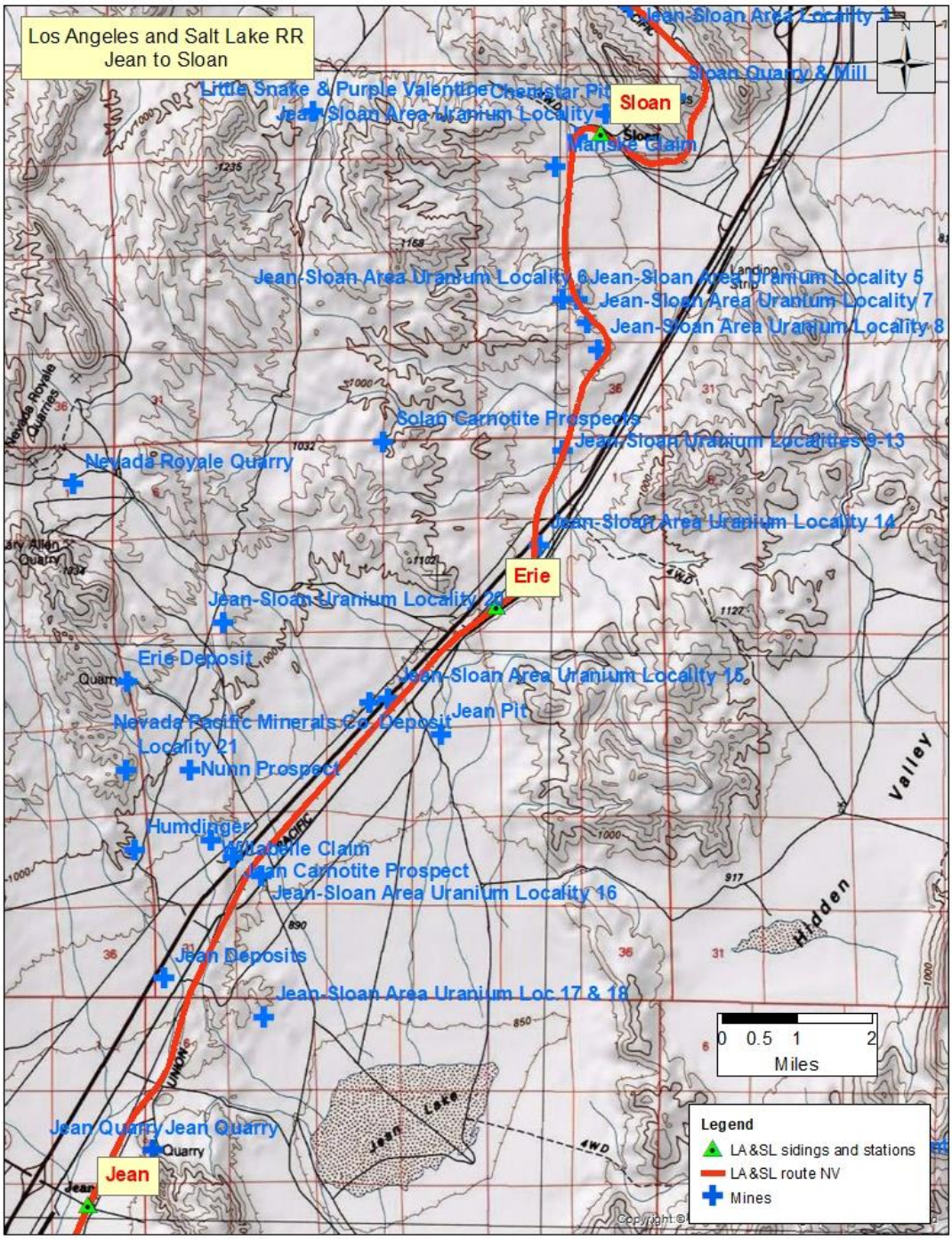
Caption. Locomotive and railroad ore cars on trestle at Yellow Pine Mine, Nevada, 1912. From Vintage Trains, https://www.pinterest.com/pin/619667229954407697/ accessed Nov. 13, 2023.

Caption : Photograph of miners and Yellow Pine mine buildings, Goodsprings (Nev.), 1900-1925. Squires Collection. UNLV Libraries Special Collections & Archives. From https://historiclasvegasproject.com/Yellow-Pine-Mining-Company-Railroad.html accessed Nov. 13, 2023.

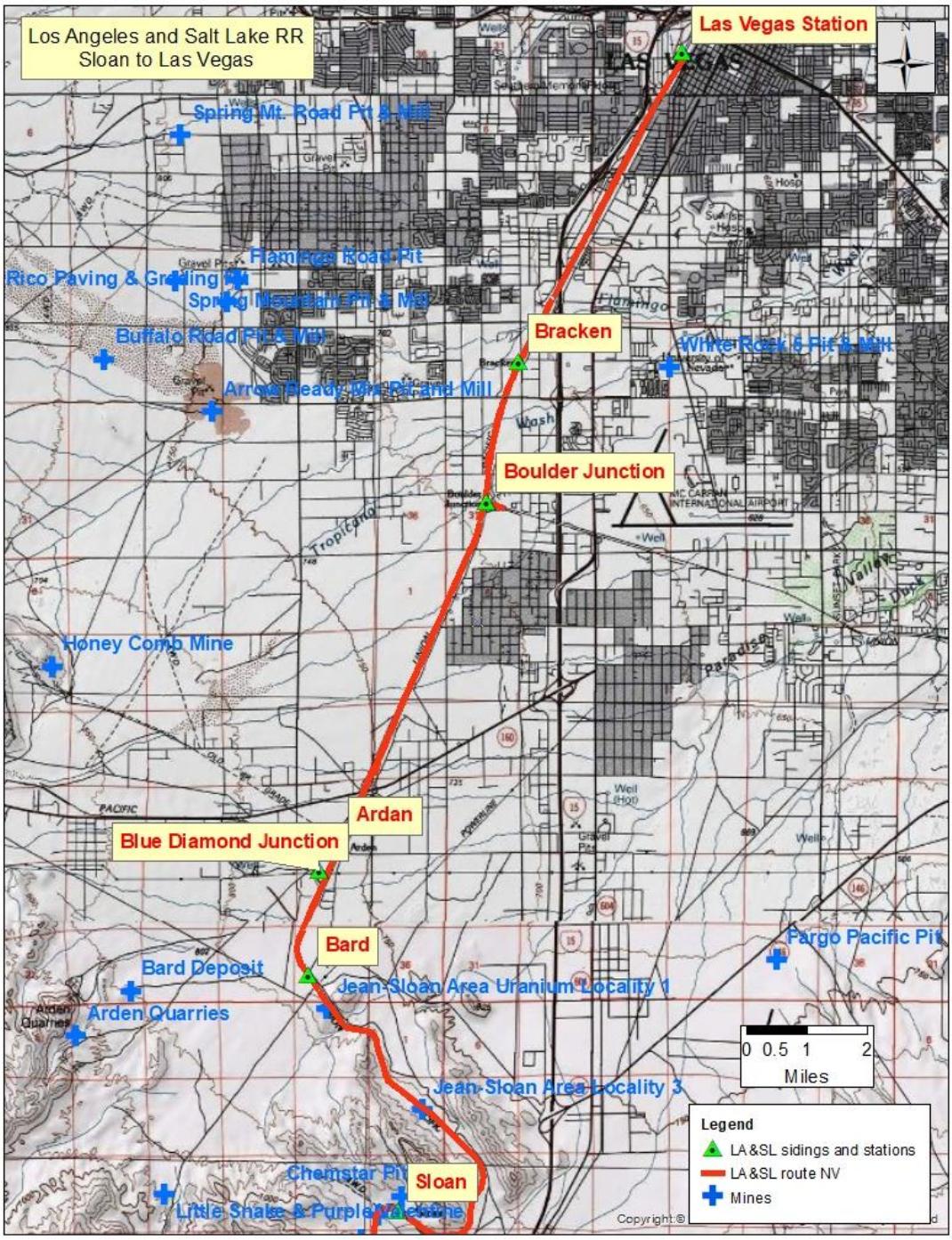
Caption: Family and Yellow Pine Locomotive. From http://gearedsteam.com/shay/images/y/yellow_pine_mining_co_1-sn2500.jpg accessed Nov. 13, 2023.

Jean Siding to Las Vegas

From **Jean** siding, the LA&SL went north to **Erie**, a siding that was near the Nevada Royale and Gary Allen Quarries to the west (Minobras, 1973; Papke, 1973, Papke and Castor, 2003). Going north from **Erie**, the LA&SL flanked the eastern foothills of the unnamed hills that have several uranium occurrences. **Sloan** siding was near the Sloan Limestone quarries (Longwell, 1965:205, Deiss, 1951:107-140).



Circling counterclockwise around the hill hosting the **Slone** quarries, the LA&SL went northeast to **Bard** and **Ardan** sidings. These sidings were near the Arden and Bard Silica quarries in the hills to the west (Murphy, 1954:169: Minobras, 1973:12, Longwell and others, 1965:205; Hewett and others, 1936).



From **Arden** two short lines connected the LA&SL to the Honey Comb Mine and the Blue Diamond Mine. The short line terminus for the **Blue Diamond Railroad** was at a tramway facility that brought limestone down from the Blue Diamond Mine on Blue Diamond Hill (Longwell and others, 1965, p. 153-154). A description of the Blue Diamond Railway is found in Part III of this report.

From **Arden** the LA&SL went north to **Boulder Junction**. Here the LA&SL met with the Henderson Railroad that connected to the mining camps of Henderson. Later this line was extended to Boulder City to facilitate construction of Boulder Dam. A description of the Henerson-Boulder city railroad is found in Part III of this report.

Northward from Boulder Junction, the LA&SL entered the suburbs of Las Vegas at **Bracken** siding thence into what is now downtown **Las Vegas**

REFERENCES

All references in this report are listed at
http://www.greggwilkerson.com/iv-references.html