

FORMATI

The Santa Fe Magazine

September
1923

*Spruce Tree House
A Prehistoric Cliff City in
Mesa Verde National Park*

Value of the Air Brake Association

By ARCHIE SKINNER, Air Brake and Valve Foreman, Corwith, Ill.

DURING the convention of the Air Brake Association held recently in Denver, Colo., it became quite apparent that more attention than ever is being given the shop end of air brake work. Many new ideas and new testing devices were introduced and explained.

One excellent feature of the convention was the exhibition of the film, "Visualized Air Brake Education," furnished by the Visual Educational Film Company of Sterling, Colo. A cross compound pump in actual operation was very clearly shown on the screen, and the thought occurred to the writer that this would be a far better way to instruct air brake repairmen than with the sectional models now used on the instruction cars. Through the use of the film, the novice can more readily form a mental picture of the equipment than by examining stationary models.

The importance of proper air brake repairs was emphasized; many moot questions were satisfactorily thrashed out, and those who attended the convention were provided information that would enable them to make several changes for the betterment of the air brake equipment on their respective roads.

The writer has observed that more attention is being paid to the education of air brake men. New instruction pamphlets are appearing, and they are written in such a way that the ordinary layman can easily understand their contents; fewer formulas and figures, which formerly tended to discourage the student before he fairly started to learn, now are being used.

Every Tom, Dick and Harry who could handle a pipe wrench previously was classed as an air brake man, and those who could clean a cylinder or hang a triple valve were classed as "experts." But, thanks to the activities of the Air Brake Association, the air brake no longer is a "Chunk of iron hanging to a piece of pipe so that air can blow in through one end and out of the other." It has ceased to be a mere stepchild, and is regarded as one of the most important units of railroad equipment. Thirty cars do not now constitute a "long" train, but they did eighteen years ago. Today it is not uncommon to see one hundred cars in a freight train, and our passenger trains can handle fifteen cars, whereas, but yesterday it seems, three or four were all that could be handled safely.

What has helped so much to bring this about? Why can we now handle more cars and make greater speed than we could just a few years ago? Let us give due credit to that "little chunk of iron" that has been brought to such a degree of development as to be almost perfect. In order to keep it functioning properly, air brake repairmen are being thoroughly educated, and more attention continually is being devoted to testing devices so that the most rigid tests may be assured.

On some railroads an apprentice machinist must serve at least three months on air brake repair work and testing.

The writer has followed the development of the

air brake from the three-way plug cock triple valve and the three-way engineers' brake valve, including the time when straight air only was used, to its present construction, and he recollects the time when trains were switched so that cars equipped with air brakes could be placed at the head of the train and those with hand brakes at the rear.

Instruction cars were not so numerous in the days when the air brake was young. Then every air brake man had his own ideas of testing and repairing and, of course, his own way was the best. The Air Brake Association has eliminated all of this. New rules, sanctioned by the American Railway Association, have been promulgated, and standard practices are being observed. Triple valves must be cleaned and tested at certain periods; in fact, all parts of the brake gear now have fixed standards.

Practically all of the present efficiency in air brake equipment can be traced to the efforts of the Air Brake Association, being results of the discussions of papers introduced by air brake men in its meetings and the ideas developed in those discussions. Perhaps someone has had trouble with a part of the equipment. He brings the matter up at the convention, the desired information is secured, and he returns to his home shop feeling as a man does on leaving a hospital—he has found a cure.

At the last two conventions tools for air brake repair work were discussed, full descriptive text and prints being published in the proceedings of the meetings. These books alone are well worth all that it costs to be affiliated with the association, without taking into consideration the great benefits that are derived from attending and participating in the meetings.



SUPT. OF SHOPS AND FORCE, CLEBURNE, TEX.
Reading from left to right, front row—W. F. Hovard, superintendent of shops; F. J. Brownell Jr., chief clerk; Miss L. I. Thrower, stenographer; Miss O. I. Shanon, general clerk; Miss J. G. Wallis, stenographer. Second row—L. M. Ezell, timekeeper; H. E. Snipes, W. F. Corbin, T. H. Covey, M. D. Russell, shop distribution clerks. Third row—H. D. Wells, assistant timekeeper; Wm. Keskeys, messenger boy; W. R. Parrish, head distribution clerk; W. G. Doughtie, assistant distribution clerk; E. B. Helsley, shop distribution clerk.



BIRD'S-EYE VIEW OF BEAUTIFUL RANCHO SANTA FE
Fertile soil, abundant sun and water, winter temperatures above 32 degrees, make valleys like this on Rancho Santa Fe perfect for citrus and deciduous fruits, walnuts, grapes and vegetables

Most Perfectly Planned Land Project in the World

By LEE SHIPPEY, Contributing Editor, Los Angeles Times

THE most perfectly planned land project in the world, although opened to prospective residents only in the middle of May of this year, already has progressed far enough to make it appear certain that the dreams of its planners are to be realized in full.

Some months ago an article in THE SANTA FE MAGAZINE forecast the development of Rancho Santa Fe, in the San Dieguito Valley, San Diego County, California. At that time, it will be recalled, it was spoken of as a favorite project of the Santa Fe Land Improvement Company, a subsidiary of the Santa Fe System, which intended to make it the pride of Southern California and a demonstration to the entire country.

To recapitulate briefly, Rancho Santa Fe was originally Rancho San Dieguito, a Spanish land grant to Don Juan Mario Osuna, soldier, judge and first alcalde of San Diego, a power in his day, who picked out the most beautiful and fertile area he could find when he retired from public life to build up a great estate, which he

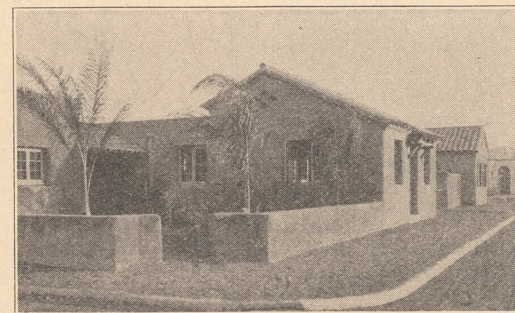
be the family seat of one of the great houses of the nobility of the New World. After the war with Mexico the fortunes of the house of Osuna dwindled until the princely estate had to be sold. Sixteen years ago the Santa Fe Land Improvement Company acquired it and ever since has been considering ways of development which would make it of greatest service to the country.

It finally was decided, after soil experts, hor-

ticulturists, hydraulic engineers, civil engineers and community planners had carefully studied its possibilities, and climatic conditions had been carefully observed, that Rancho Santa Fe offered the ideal location for orange, lemon, walnut, olive, avocado (alligator pear) and deciduous fruit orchards, as well as other fruits and winter vegetables. Thus beautifully situated in sight of the Pacific Ocean, in a region never uncomfortably warm, the smudge pots which are the greatest profit-stealers to citrus fruit growers in more northern districts have never been needed there, and the most delicate of winter vegetables can be gathered for market in December and January.

The idea of an ordinary land development project did not satisfy the company. It was decided to make this subdivision one which would demonstrate to the entire country both the possibilities of Southern California and the possibilities of a community planned by experts. It was argued that a community planned and developed with certain definite aims in view would be as superior to one which "just grew" as a building erected to architects' plans would be superior to one erected by several hundred builders of varying ability, working independently of each other.

So the great, fertile rancho was subdivided into four hundred tracts, in accordance with the findings of the soil experts and horticulturists, who had made charts showing what each tract



A CORNER IN THE CIVIC CENTER

In Rancho Santa Fe not one bit of ugly construction or distasteful architecture mars the view. Even the garages are artistic, of the pure Spanish type.

could safely be counted on to do in production and annual income. Fifty-one miles of good roads then were built, putting each tract on a good highway, and water for all domestic and irrigation purposes was piped from beautiful Lake Hodges, six miles away. The company next built a hotel and civic center which artistically revivify the old Spanish glory of the estate. The old adobe ranchhouse of the Osunas, covered with roses which bloom both winter and summer and shaded by giant pepper trees nearly a century old, still stands on the bend of a circular avenue of palms, and the spirit of eternal beauty and romance which comes over one there is not lost but heightened as he drives through a smooth lane of stately, tonic-breathing eucalyptus trees and comes suddenly on a hotel which looks like the home of some comfort-loving don in the Pyrenees and a civic center in which even the garage and filling station are works of such artistic beauty (though with every ultra-modern appurtenance) that artists grow ecstatic at sight of them.

It was planned to make Rancho Santa Fe, first of all, a region in which success was assured and, secondly, a place in which beauty and artistic surroundings would be safeguarded. Not only have experts drawn up charts showing what will prove most profitable on each tract, but they are still on the ground to give any assistance desired to buyers when they begin development. Not only have the artistic highways been so arranged as virtually to park the great estate, but the services of a noted community planner are at the disposal of every prospective resident. And not only is every building erected so far designed to harmonize perfectly with and to express its environment, but the advice of the same distinguished architects is at the service of every home builder. It is intended that this community of four hundred families, occupying an area nearly five miles long and nearly four miles wide, shall be one of notable productivity and prosperity and also one in which not one bit of ugly construction or distasteful architecture shall mar the view of other residents.

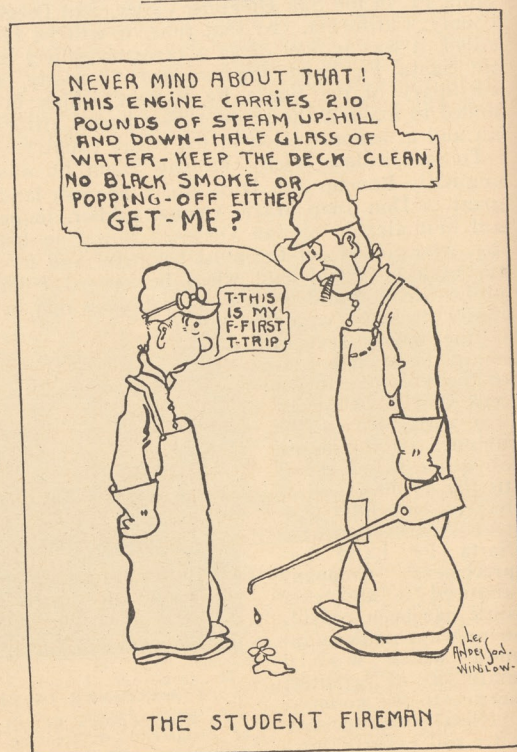
Can that be said of any comparatively large area in Beverly Hills or Hollywood or the North Lake Shore or Riverside Drive or Irvington-on-Hudson or the Champs Elysees? Hardly. And yet it is working out at Rancho Santa Fe. For here there is nothing to be undone. There are no unsightly structures or misplaced streets to be made over. Beginning with a great, fertile, rolling cattle ranch, the most scientific and practically successful men available have planned every step of this community's progress.

It is a noteworthy fact that in every case those who already have bought tracts in Rancho Santa Fe have been especially attracted by the "restrictions" which safeguard the district against temporary shacks or unsightly buildings and the land against mismanagement which would be injurious to the community. Not only are the recommendations of the experts being followed in the plantings being made, but the experts themselves are constantly called into consultation by those who are developing their holdings. Their attitude is not dictatorial but rather that of friendly helpfulness, and that helpfulness is being accepted gladly. Orange, lemon, avocado and other groves are being set

out, homesites selected and homes being built in such a way as to carry out the idea on which the community was founded.

Already the progress of Rancho Santa Fe is such that people are traveling long distances to see it. It is an interesting fact that up to date Chicago and Los Angeles have furnished more of the buyers there than have any other communities, and that some have come from as far away as Massachusetts. Only those the company feels sure will succeed are encouraged to locate there (which in itself indicates how different it is from ordinary land projects) or it would have been sold out before now. Yet the company feels that anyone who will develop the land in the most practical way and accept the friendly assistance of the staff of experts cannot do other than succeed and prosper, whether he has ever lived in Southern California or not, provided he has sufficient means fully to develop his holdings. No one is permitted, incidentally, to buy more land than he can develop fully nor less than will, if fully developed, produce the income he requires from it. The land may be bought on long-time payments, but the buyers must have money to develop it fully at once, and the company feels that a buyer should have not less than \$10,000 to insure his success there.

Beautiful as Rancho Santa Fe is, the orchards already set out and the artistic modern homes already building make it certain that it will be even more beautiful in a few years. No one can go there now, see what has been done and study the plans for its continued development, without being convinced that within a decade it will be what the planners have set out to make it, one of the loveliest as well as one of the most prosperous communities in the world.



THE STUDENT FIREMAN

Traveling by Rail in China

By LUCILE GRAHAM*

ROLLING along in a train over a Chinese railway through the grave-dotted fields in China is really quite different to being whirled over the plains and prairies of the good old U. S. A. in a Santa Fe train. However, rail service is much better than I had expected to find it in a country so far behind in modern developments as China is, and the trains from Shanghai to Peking would compare favorably with any I have ever seen.

Recently I took a rail trip from Shanghai to Hangchow on the Shanghai-Hangchow-Ningpo Line. This was my first trip on a train in this country although I had intended to go from Hongkong to Canton via rail, but, as the trains were not running on account of the activity of Sun Yat Sen's army in that vicinity, I was obliged to go by boat.

My first impression of the train was how very small everything was. The engine looked like a toy beside some of the mikes and mallets I have been accustomed to seeing on the Santa Fe. The coaches were smaller, too, but the number used to make up a train was practically the same. However, the scenery was much different from that seen through one of our car windows. Graves are everywhere. It is true, indeed, that China lives for its dead and not for its living. The poorer graves are but mounds rising from the low, flat rice-fields, but the more pretentious had small shrines. Some of the latter are quite elaborate with beautiful, well-kept grounds surrounding them.

As soon as a Chinese boards a train, and gets his belongings and himself settled, he rings for the tea-boy to bring him some tea. He usually brings cakes with him from home, and from the start of the journey until the destination is reached he consumes tea and cakes. It doesn't seem to take the foreigners long to acquire the same habit either.

The train is divided into first, second and third class coaches, and as it was Saturday morning and many Chinese were leaving Shanghai for the week-end, it was very crowded. The first-class coaches are divided into compartments seating six persons each; the second-class coaches have stationary double seats with a table; and the third-class have long seats down each side with a long double seat through the center, and sometimes there is a fourth-class coach on the train with no seats at all, the coolies standing throughout the journey. First-class fares are double second-class; second-class fares are double third-class, and so forth.

As I mentioned before, the trains running to Peking on the Tientsin-Pukow Railway are unsurpassed by any I have ever seen. The old wood express trains, which made the trip to

Peking a bugbear, recently have been replaced by modern semi-steel trains. These were purchased from the Pressed Steel Car Company of New York; were built in Pittsburg and Wilmington, and assembled at the Tientsin-Pukow shops in Puchen. All steel used in the cars and bogies, and axles and wheels, was supplied by the United States Steel Corporation.

The interior finish of the first-class cars is mahogany; second-class, quartered oak; pitch pine for the third; and steel for the postal and baggage cars. The floors of the first-class coaches are covered with beautiful Wilton carpets and the vestibules and halls have red and green tile. In the second-class cars brown linoleum is used. Dining-cars and first-class cars are upholstered in brown Spanish leather; for the drawing-room green plush; fabricord is used in the second and third-class cars.

The dining-car can accommodate thirty-six people at one time, and the furnishings are of the best. Exquisite Irish linen is used on the table and the silver is of the Hotel Ambassador design. The glassware and china are dainty and in keeping with the rest of the equipment.

The first-class sleepers have eight coupes, each accommodating two people. There is a sofa extending crosswise which is used for the lower berth. On the opposite side next to the window are individual seats which enable both occupants to be seated next to the window. The upper berth is similar to those at home.

The second-class coaches have seven coupes each seating four passengers. The seats are used for lower berths and the backs for uppers, the back being pivoted and held by leather covered chains.

The third-class sleepers have eight coupes with room for six in each one. The uppermost berth is stationary and is used for luggage in the daytime. The lower berths are made from the seats, and the backs compose the uppers as in the second-class cars.

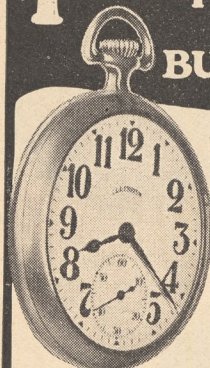
There are now seven kinds of locomotives in use on the Chinese Government Railways, viz: Mogul, Prairie, Mallet, Pacific, Consolidation, Mikado and Compound ten-wheeler. The Consolidation has eight driving wheels and the rest all have six. The average tractive power of all locomotives of all lines is approximately 21,000 pounds, with the exception of the Peking-Suiyuan line, where it is about 30,000 pounds.

The weight of passenger trains averages 350 to 600 tons, and freight trains average from 700 to 1,200 tons. The rails now in use weigh from 65 to 85 pounds per yard. The maximum speed is 45 miles an hour, but this is not due to difficult grades or curves, as the former rarely exceed 1 percent except at the Hankow pass, where it is 3½ percent, while the curves have a minimum of 300 meters.

It is considered an unwise move by many to inaugurate in China such trains as the ones on the Tientsin-Pukow Railway (because they sur-

*Until recently Miss Graham was a stenographer in the general offices of the Santa Fe in San Francisco. She is now connected with the commercial attache service of the U. S. department of commerce in Shanghai, China.

\$1.00 BRINGS YOU This Famous Illinois BUNN SPECIAL



Most remarkable watch offer ever made! Simply send me \$1.00 with your name and address—that's all.

**No Red Tape
No Delay**

We'll send this famous six position—21 Jewel Illinois Bunn Special, guaranteed to pass railroad inspection—for **30 days Free Trial.** Take

four full weeks to test this remarkable timekeeper under any and all conditions. If satisfied, pay only \$5.65 a month until you have paid only \$57.50—Regular cash selling price. Otherwise return it and we will refund your dollar. Only a limited number sold on this plan—Rush your dollar TODAY.

FREE Send today for a copy of our introductory catalog. America's Best Values in Diamonds, Watches, Jewelry—PAY-AS-YOU-PLEASE. Your own terms within reason. Address Dept. 64-S.

O.F. Bale & Co. EST. 1888
21-23 Maiden Lane New York

**Attractive and Comfortable
4-Pocket
Sport
Coat**
A stylish knitted coat unmatched at this special price
\$2.98



Colors
Blue
Dark-
Green or
Brown

Sizes
34
to 46

Just by a Streak of Good Luck
can we offer you this very necessary and convenient sport coat, and at this price they will go fast. This coat is good for so many purposes that every man should have one to realize their necessity. **BUY ONE NOW** for early fall hunting, fishing, golfing or any outdoor use. Made of extra quality wool mixed yarn—four pockets with flaps, form fitting coat and close fitting cuffs. **Order by No. AD-815.**
Just your name, size and color and pay **Send No Money** postman \$2.98 on arrival plus postage.
Lee Thomas Co. 800-10 So. Kedzie Ave. Dept. 498 Chicago

this instruction: "Please take the roundabout way home."

Prompted by the unusual success of the first annual picnic of the Santa Fe Athletic club, a second outing was held at Urbita Springs, a few miles from San Bernardino, last month. Nearly 400 persons attended the picnic. It was the first event of several now scheduled by club officials toward financing the proposed S. F. A. C. swimming plunge, and for increasing the membership of the club. The feature attraction of the athletic program was the victory of an all-star aggregation over the storehouse shop league champions, 10-4. In the evening the merry-makers of terpsichorean ability "did their stuff" to the strain of the talented five, known as the Mission Melody Makers.

SAN DIEGO

(W. R. Brisco, care agent)

Yardmaster Ruggles has taken a 30-day leave of absence in an effort to regain his health. His place is being filled by J. W. Staggs, formerly a conductor on the San Diego run.

Recent reports indicate that National City is to become a big tie and creosoting yard where a large number of men will be engaged to keep up with the creosoting work for this division.

The San Diego naval base has had a change of commanders, Admiral Welles being relieved by Admiral Robertson, formerly of the cruiser San Diego, which was torpedoed in the Atlantic during the war. Admiral Jones was relieved of his command of the battle fleet flagship U. S. S. Seattle by Admiral Coontz. The army transport U. S. S. Chamunt arrived recently with the congressional party, the members of which made the rounds of the various government projects here. From all reports, San Diego is destined to become a great naval base in the near future.

Three officials of Australian railways attended the Santa Fe traffic meeting here and the Coast Lines' loss and damage meeting last month as the guests of Acting General Manager Etter. These gentlemen, Messrs. J. M. Ashworth, A. R. Stamp and E. Dillon, have been sent to the United States by the railroad commissioners of Australia to glean such information as they can about American railway methods, with a view to applying such as will fit conditions in their own country. They arrived in Vancouver about two months ago, and have been traveling southward since, making investigations along the way. They expect to remain in California three or four weeks, and will then go east to continue their researches, returning to their homeland by way of Canada.

SAN FRANCISCO

(W. J. Hennessy, care agent)

Sam Davis, chief of the expense department, recently enjoyed his first two weeks' vacation in twenty years.

Sympathy is extended to Miss Nellie Fallon, of the local freight office, in the recent loss of her father; and also to Grant Onyon, of the local freight sheds, in the loss of his mother last month.

Will someone in the up-town office kindly pass all news items to Mr. Hennessy so they will reach him by the fifteenth of each month? This applies likewise to the other offices—the more the merrier.

Our esteemed section foreman, Charlie Ro-

California's Supreme Achievement

in rural community development

Rancho Santa Fe

income producing citrus groves amid environments of surpassing beauty

Picturesque Terrain between Sea and Mountains provides frostless elevations ideal for growth of *Avocados, Citrus* and other profitable sub-tropic fruits and assures unequalled

Climatic Comfort

which will, in a few years, make a home in this delightful region almost priceless

Home building and all development operations highly restricted to secure and protect investment

Artistically designed business and residential center, including attractive guest house for the comfort of visitors, comprise "a completely planned community in the building"—NOT a real estate operation.

5 to 40 acre units abundantly irrigated, expertly planned for people who can qualify to carry this class of investment

Mail this page with address and get story of

Name _____

Address _____

Town _____

State _____

**RANCHO
SANTA FE**

SANTA FE LAND IMPROVEMENT COMPANY

*Rancho Santa Fe, Del Mar, San Diego County, California, or
A. B. Harlan, 407-8 Security Building, Los Angeles, Cal.*