

## SWANTON PACIFIC RAILROAD SOCIETY

Number 129

Cal Poly

March 2004

### ON TRACK with your Director

Ed Carnegie:

The February work weekend was very productive. Under the helping hand of Marty Campbell prepping continued on the Tank Car. While Marty and I worked on the tank car, Martha, Carol, Hart, Martie Way, Frank Smith and Bill McNab did some needed clean up on the brush around the red house. The track crew consisting of Dick Toulson, Richard Mehr., Mac Gaddis, Stan Matsumoto, Pete McFall, under the leadership of Dennis, removed a clump of two relatively large Alders and a couple of smaller ones that had gone across the creek and were leaning on the bridge. This ended up being a most interesting task as Richard used the crane to lift parts of the Alders out of the creek and onto the flat cars to be used as firewood later.

Saturday night, Martie Way, Bob Wilkinson, Martha and others put on an outstanding Valentine's Day dinner for all.

A Board Meeting was held Sunday morning. During the Board Meeting Marty Campbell was out putting a primer coat on the tank car. In the afternoon, Geoffrey Tobin, Fitz, Andy, and I ended up mixing concrete by hand because the motor in our electric mixer failed a smoke test and was considered non-operational. The concrete was used to produce four man-hole-covers on the end of the leach field, which will now allow for easier movement in that area behind the roundhouse, compared to the pipes that were formerly sticking up in the air. Within a few dry days, prior to our workday, Pete McFall and Richard Mehr, leveled and smoothed out the area so that we knew the grade necessary for the manhole covers. Ernie

continued to diligently work on the refinishing of the station benches, though the rainfall has slowed him down a bit, it has not stopped his efforts. .

This coming month we will have to concentrate our efforts on getting all things in order for the upcoming April Al Smith Day. Please be ready to sign up for any needed tasks that will be required of all to make the day successful. Also remember, that Al Smith Day will be the first weekend in April, NOT THE SECOND-as this would conflict with Easter Sunday.

### UPCOMING EVENTS/PUBLICITY

Mary Ann Carnegie

- |             |                                    |
|-------------|------------------------------------|
| March 13/14 | St. Patrick's Day work weekend     |
| April 3     | Work Day getting ready for Sunday  |
| April 4     | AL SMITH DAY RUN [Palm Sun]        |
| April 13/14 | Easter weekend—                    |
|             | <b><u>NO WORKDAY SCHEDULED</u></b> |
| May 8       | work day—                          |
| Sun May 9-  | Mother's Day-go home to Mom's      |
| May 29-31   | Memorial Day Work Weekend          |

This year for Al Smith Day, Martie Way and Bob Wilkson will be the co-chairs. At the March work day they will be asking for all of your support to make the day successful. So please step forward and volunteer for as many as tasks to help with during the course of the day. We will need assistance with parking, registration, sales, operation, serving, and especially with clean-up. Martie and Martha are also planning on having a St. Patrick's Day dinner on the Saturday work weekend night in March. So if you are planning on attending it would be nice for you to call and leave your RSVP at the SPRR phone (831) 423-8204. Please notice too that May brings us back to having two

work weekends each month. The second work weekend in May does fall on the Memorial Day three day weekend for most. So we hope to be able to catch you at one or maybe even both of the work weekends.  
MAC



Removing downed tree from creek



Valentine's Day dinner, Look who dressed up

NEW SOCIETY SUPPORTERS received over the last month were as follows:

- |               |               |
|---------------|---------------|
| Olin Anderson | Woodland      |
| Alvin Wilson  | Scotts Valley |
| Dana Morelli  | Scotts Valley |
| Tim Dougherty | San Jose      |

On behalf of the entire organization, we welcome each of you into our "train family" & we certainly look forward to seeing you at some of our next events. Many of our supporters may not recognize you right away so please introduce yourselves so that we can get to better know you & vice versa.

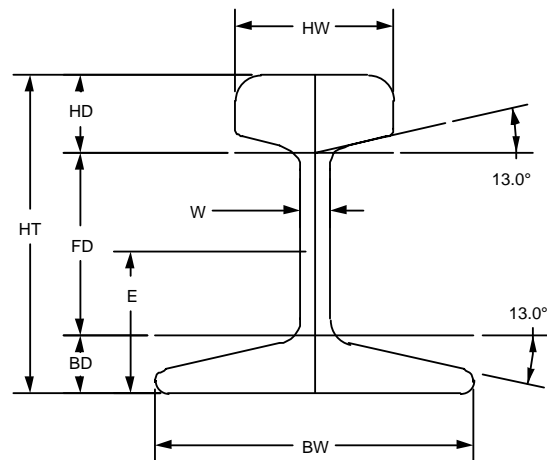
### Track Nomenclature

By E. J. Carnegie

Track being a major part of our railroad we all need to know something about our foundation. Lets start out by looking at a section of rail that we use on SPRR. Rail is listed by weight in pounds per yard. Most of the rail used on the SPRR is 16 lb. Rail, with some 12 lb. used in buildings, (for light use) and some 20 pound rail placed in storage. Rail is made up of three distinct parts, Head, Web and Base or flange. Standards for light rail in the sizes that are used by SPRR are established by the American Society of Civil Engineers, (A.S.C.E.). Definitions of dimensions are shown in Figure 1. Where

HT – Height, BW - Width of Base, HW - Width of Head, W - Web, HD - Depth of Head, BD - Depth of Base, and E - Bolt Hole location

Figure 1: Dimensions for tee rail



The size or weight of the can be found by measuring the height, HT, or base, BW, which are equal in A.S.C.E. rail, and compare it with the standard dimensions as listed below1.

TABLE 1: TEE RAIL SECTION DATA

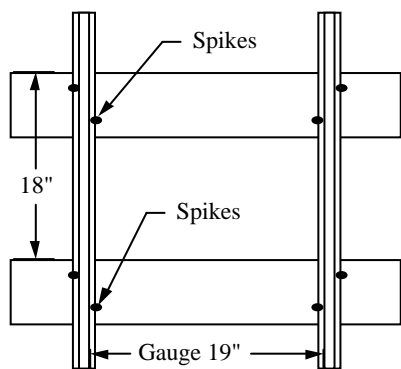
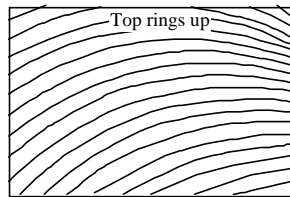
Normal Weight Per Yard	DIMENSIONS, INCHES	
	HT	BW
12 lb.	2	2
16 lb.	2 3/8	2 3/8
20 lb.	2 5/8	2 5/8

Rails are made in a hot rolling process cut to a normal length of 30 feet. SPRR has found that a great amount of variability exists in steel between

one manufacture to another. Some rail will work harden and become brittle. Rail that will work harden, will bend once, but if forced to bend often will brake.

When laying straight track along a right-of-way the bed should be graded and compacted. If possible, the rail bed should be raised above the soil level or aligned to insure good drainage. The side bank should be clean of plant material and graded to minimize soil erosion. After the track bed is graded, underlayment should be placed on the soil to form a barrier between the soil and the ballast.

The underlayment will allow water to drain through the material and stop the fines in the soil from moving up into the ballast. Ties can then be placed at the proper spacing along the right-of-way. Ties should be placed with the curve of the grain on the tie facing up, see Top ring up. You could think of the grain forming a dome to shed water. Tie spacing used for most tracks on SPRR is 18 inches. After the ties are aligned, the track can be put in place, and fishplates are bolted in place. The rail should be bolted with a gap of 1/8 inch between the rail ends. To minimize heat kinks, as the rail heats up and expands, grease should be placed between the rail and the fishplates. The fishplate bolts should be tight, but not over tightened.

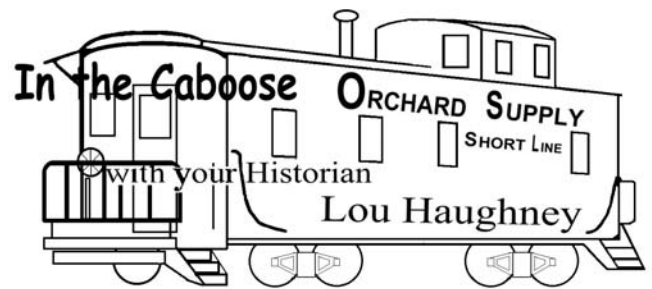


After the track is in place and bolted together, the track is ready to be spiked in place. The spikes used by SPRR are 3/8 x 3". They are placed in a trapezoid pattern as shown

in Figure 3 above. The ties are pre-drilled and then treated so that the treating goes through the holes and makes driving spikes easier. It is important to drive the spikes straight down through the predrilled holes because the treatment protects the tie from the penetration of the spike. Also a spike driven

perpendicular to the rail will hold a greater side load.

After a sufficient amount of track has been laid, ballasting and alignment may begin. Every effort should be made to keep the track as straight as possible. Alignment is accomplished by a team effort of one person sighting down the rail and one or more workers using bars to move the rail as directed.



THE OVERFAIR PACIFIC LOCOMOTIVE NO. 1915 AT THE CALIFORNIA STATE RAILROAD MUSEUM

By Lou Haughney

Long-time SPRS active member "Mac" Gaddis took an excellent photo of the restored Overfair Pacific 1915 locomotive in the lobby of the California State Railroad Museum (CSRM) during a visit there in April, 2003. That locomotive, never completed by MacDermot, was obtained by Al Smith in 1982 from the sale of the Jervis estate. Al then donated the 1915 to the CSRM where its exterior was restored, or completed as needed, by staff and volunteers.



MacDermot's Overfair locomotive No. 1915 displayed in the lobby of the California State Railway Museum (CSRM) in Old Sacramento.

Photograph was taken by SPRS member Malcolm R. ("Mac") Gaddis.

"Mac" found in his files an article in a CSRM publication that describes the arrival of the locomotive and the plans for its restoration. Mac's photo and the article are reproduced below. Thanks to Mac for providing this addition to our history of the Overfair locomotives.

From the newsletter *ON TRACK / A Publication of the California State Railroad Museum Associates*, Vol. 11, No. 1 / Winter 1990. (author not listed)

#### 1915 PANAMA-PACIFIC EXPOSITION LOCOMOTIVE TO GRACE CSRM

Overfair Railway steam Locomotive No. 1915, built by Louis M. MacDermot of Oakland, California, arrived at the California State Railroad Museum Restoration Shop on September 26, 1989, a gift of new CSRM Foundation board member Albert B. Smith. This one-third scale 4-6-2 engine and tender was one of five locomotives, 60 covered passenger cars and five freight cars constructed for the Overfair Railway, a 19-inch gauge line which operated on the grounds of the 1915 Panama-Pacific International Exposition in San Francisco.

Over a two-year period MacDermot designed and built the equipment in shops on his family's property in Oakland. The four Pacific-type locomotives were numbered 1912, 1913, 1914, and 1915, and an 0-6-0T switch engine was numbered 1500. While four of the pieces were completed, the No. 1915 was never finished. The anticipated completion date for the Museum's Overfair project is May 1991, in time to place the 28-foot long No. 1915 in the lobby of the Museum of Railroad History for the 10th anniversary celebration.

When the fair opened on February 20, 1915, MacDermot was ready to carry passengers along San Francisco Bay on the northern boundary of the Exposition grounds. After the fair closed in December, the Overfair equipment returned to Oakland. The locomotives remained stored except for a brief period in the early 1940's when MacDermot ran No. 1913 on the Mountain Railway at the Alameda County Zoological Gardens in Oakland.

After MacDermot died in 1948, the locomotives and few surviving cars went to retired Southern Pacific locomotive engineer Billy Jones, proprietor of the famed Wildcat Railroad in Los Gatos. Jones restored some of the engines and converted them from burning coal to oil. The 19-inch gauge equipment, however, would not run successfully on the Wildcat's sharp curves. Once again those finely crafted pieces returned to storage.

During the 1970's, two buyers obtained the equipment from the Jones estate. Numbers 1912 and 1943 operated during the late 1970's at the Calistoga Steam Railroad on Napa County while the Nos. 1914 and 1500 saw service at the Orange County Fair beginning in 1975. No. 1915, which never ran at the Exposition, remained incomplete.

Santa Clara rancher Al Smith is responsible for reuniting all of these historic pieces of live steam equipment. In the earlier 1980's he purchased the existing Overfair equipment as well as a substantial collection of spare parts, patterns, and drawings. On his property north of Davenport he built a roundhouse and shop, and laid approximately 1-3/4 miles of 19-inch gauge track. There, in a serene wooden valley, two of the locomotives operate again along the route of Smith's Swanton Pacific Railroad. The restoration of the 1914 and the switcher are underway in the Swanton Pacific shops.

The restoration of No. 1915 was a joint effort of Museum staff, volunteers, and members of the Sacramento Valley Live Steamers. Project director is Museum Docent Milon Thorley who is vice-president of the Sacramento Valley Live Steamers and operator of the 12-inch gauge Folsom Valley Railway. The Pacific Coast Chapter of the Railway & Locomotive Historical Society is generously providing funding for the restoration project. Al Smith's gift of the original ink-on-linen drawings greatly enhances the Museum's ability to restore the locomotive to Louis MacDermot's original conception. Once completed, visitors to the gala Railfair '91 event will have the opportunity to examine closely this unique California-built live steam locomotive.

NOTE: Milon Thorley, mentioned above as the restoration's Project Director gave us an account of the Project for the December 2001 SPRS newsletter, which has additional details and background information on the restoration.

When visitors come to Swanton on our run days, I learn that many of them had already seen the 1915 in the CSRM lobby, but they did not realize that the other Overfair locomotives were operating here at the Swanton Pacific Railroad. Do any other members of the CSRM group and the Sacramento Valley Live Steamers have recollections of working on the No. 1915