

ORIGINAL

Decision No. 69526

BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF CALIFORNIA

Investigation into the safety, maintenance, operation, use, and protection of the crossings at grade of North Green Street, Crossing No. B-360.5; Hayes Street, Crossing No. 360.9; and Snyder Avenue, Crossing No. B-361.1, with the double track main line of Southern Pacific Company and The Atchison, Topeka & Santa Fe Railway Company in or near the City of Tehachapi.

Case No. 8082

(Filed December 15, 1964)

Harold S. Lentz, for Southern Pacific Company and The Atchison, Topeka & Santa Fe Railway Company; Philip M. Wagy, for the City of Tehachapi, respondents.

Howard D. Amacker, for Monolith Portland Cement Co., Inc., interested party.

Mitchell M. Brockman and M. E. Getchel, for the Commission staff.

O P I N I O N

The above-entitled investigation is to determine whether or not public safety and health require the reconstruction, relocation, or alteration of; the installation and maintenance of additional protective devices at; the alteration of existing protective devices at, or the abolition of three rail crossings in the City of Tehachapi, namely: North Green Street (Crossing No. B-360.5), Hayes Street (Crossing No. B-360.9), and Snyder Avenue (Crossing No. B-361.1). The investigation is for the additional purposes of determining the terms on which any such relocation, alteration, abolition, installation or maintenance, or protection shall be done and to make such

apportionment of costs among the respondents as appears just and equitable.

Notice of hearing on the order of investigation was served on The Atchison, Topeka & Santa Fe Railway Company (Santa Fe), the Southern Pacific Company (Southern Pacific) and the City of Tehachapi (City). A public hearing was held in Tehachapi on June 15, 1965, before Examiner Rogers and the matter was submitted. It is ready for decision.

The City is located approximately 40 miles southeast of Bakersfield on U. S. Highway 466. The elevation is approximately 4,000 feet resulting in snow and ice conditions in the winter months.

The principal industry in the area is the Monolith Portland Cement Company located four miles east of the City. The cement company operates three work shifts daily and employs many of the residents of the City.

The Southern Pacific owns and maintains the tracks from Bakersfield to Mojave. These tracks are used jointly with the Santa Fe.

The new U. S. Highway 466 freeway will bypass the City approximately one-half mile north of the present U. S. Highway 466 and is scheduled for construction during 1967 and 1968 with completion in 1969. A diamond interchange will be constructed on the freeway due north of Mill Street and a connection from Mill Street to the interchange is contemplated. Mill Street is three blocks west of North Green Street, the westernmost crossing herein considered. The distance from Mill Street to North Green Street is

approximately 1,250 feet and Mill Street does not presently cross the Southern Pacific right of way, which runs approximately east and west. The streets on which the considered crossings are located cross the right of way at approximately 90° angles.

The physical characteristics, protection, vehicular traffic, train traffic, and accident records at each of the crossings are set out below. None of the respondents presented any evidence at variance with such information.

NORTH GREEN STREET

Crossing No.:	B-360.5
Number of Tracks:	2 - Mainline; 1 - House Track
Width of Crossing:	64 feet
Approaches:	Asphaltic Concrete
Type of Crossing:	Plank
Grades of Approach:	From South - Approx. 3% Ascending From North - Approx. 3% Ascending
Angle of Intersection:	90°
View Conditions by Quadrant:	NW - Clear NE - Clear SW - Obstructed SE - Obstructed
Present Crossing Protection:	2 - Standard No. 8 Flashing Light Signals with 2-Train Indicators 2 - Reflectorized Advance Warning Signs
24-Hour Vehicle Count:	1,400 Vehicles

Note: 24-Hour Count Made January 1965
School Bus Crossing

Train Movements:	Passenger 6
	Freight 50 (Approximately)

Note: Train movements include both
Southern Pacific and the
Santa Fe.

Authorized Train Speed:	Passenger - Eastbound	79 MPH
	Westbound	25 MPH
	Freight Eastbound	60 MPH
	Westbound	25 MPH

Reference - Southern Pacific Company
San Joaquin Division
Special Instructions

Accident Record:

<u>Date</u>	<u>No. Killed</u>	<u>No. Injured</u>
9-11-28	-	-
1- 4-34	-	1
6- 6-45	-	1
12-10-46	-	1
3-17-54	-	-
1-18-56	-	2
1-18-57	-	-
12-20-58	-	-

Note: No accidents since automatic protection installed 4-1-59.

HAYES STREET

Crossing No.	3-360.9
Number of Tracks:	2 - Mainline; 1 - Side; 2 - Spur
Width of Crossing	18 feet
Approaches:	Asphaltic Concrete (Poor Condition)
Type of Crossing:	Asphaltic Concrete (Poor Condition)
Grades of Approach:	From South - Approx. 10% Ascending From North - Approx. 15% Ascending
Angle of Intersection:	90°
View Conditions by Quadrant:	NW - Obstructed NE - Obstructed* SW - Obstructed SE - Clear
	*Obstructed when siding is used for car storage.
Present Crossing Protection:	2 - Standard No. 1 Crossing Signs 2 - Reflectorized Advance Warning Signs
24-Hour Vehicle Count	644 Vehicles

Note: 24-Hour count made January 1965
School buses use crossing only when empty

Train Movements	Passenger 6
	Freight 50 (Approximately)

Note: Train movements include both
Southern Pacific and the
Santa Fe.

Authorized Train Speed:	Passenger - Eastbound	79 MPH
	Westbound	25 MPH
	Freight - Eastbound	60 MPH
	Westbound	25 MPH

Reference - Southern Pacific Company
San Joaquin Division
Special Instructions

Accident Record:

<u>Date</u>	<u>No. Killed</u>	<u>No. Injured</u>
9-26-35	-	-
4-16-55	-	-
10-21-57	-	-
6-22-58	-	-
1-22-62	-	-
8- 9-64	-	-

SNYDER AVENUE

Crossing No.: 3-361.1
 Number of Tracks: 2 - Mainline; 1 - Side
 Width of Crossing: 14 feet, 6 inches
 Approaches: Dirt and Gravel (Very poor condition)
 Type of Crossing: Paved (Very poor condition)
 Grades of Approach: From North - Approx. 18% Ascending
 From South - Approx. 4% Ascending
 Angle of Intersection: 90°
 View Conditions by Quadrant: NW - Obstructed* NE - Clear
 SW - Clear SE - Clear

*Obstructed when side track
 used for storage.

Present Crossing Protection: 2 - Standard No. 1 Crossing Signs
 1 - Reflectorized Advance Warning
 Sign
 24-Hour Vehicle Count: 70 Vehicles

Note: 24-hour count made January 1965

Train Movements: Passenger 6
 Freight 50 (Approximately)

Note: Train movements include both
 Southern Pacific and the
 Santa Fe.

Authorized Train Speed: Passenger - Eastbound 79 MPH
 Westbound 25 MPH
 Freight - Eastbound 60 MPH
 Westbound 25 MPH

Reference - Southern Pacific Company
 San Joaquin Division
 Special Instructions

Accident Record:

<u>Date</u>	<u>No. Killed</u>	<u>No. Injured</u>
12-24-54	-	-

The staff Associate Transportation Engineer who investigated the crossings and made the report thereon made the following recommendations relative to each.

North Green Street Crossing No. B-360.5

The North Green Street crossing is the main crossing connecting the residential area and airport on the north side to business area, residential area, and schools located on the south side of the Southern Pacific tracks.

The high volume of vehicular traffic over two main line tracks with the very high rail movements of the Southern Pacific and the Santa Fe creates an accident potential that warrants upgrading the existing automatic flashing lights and two-train indicators to two Standard No. 8 flashing light signals supplemented by automatic gate arms.

Recommendations

(a) Southern Pacific install two Standard No. 8 flashing light signals supplemented by automatic gate arms, with predictor circuits.

(b) Southern Pacific and City share installation costs on a fifty-fifty basis.

Hayes Street Crossing No. B-360.9

The Hayes Street crossing is, at the present time, the only reasonable alternate crossing to North Green Street, permitting access between the southern and northern parts of the City. A 24-hour check made in January, 1965, shows a total of 644 vehicles or approximately an average of 27 vehicles per hour. Vehicle checks made on May 4 and 5, 1965, revealed peak

hour use between the hours of 3 p.m. through 5:30 p.m., averaging 60 vehicles per hour. The peak traffic reflects shift changes at the Monolith Portland Cement Company.

The speed and length of freight trains were noted to vary considerably. The time for westbound freight trains to clear the Hayes Street crossing varied from 50 seconds to a high of 3 minutes 17 seconds.

The existing crossing should be widened and improved, and protected by two Standard No. 8 flashing light signals supplemented with gate arms.

Recommendations

(a) Southern Pacific install two Standard No. 8 flashing light signals supplemented by automatic gate arms with predictor circuits.

(b) Southern Pacific and City share installation costs on a fifty-fifty basis.

(c) Southern Pacific raise side track on north side of main line track approximately 18 inches to improve crossing approach grade.

(d) Southern Pacific improve and widen crossing to a minimum width of 24 feet.

(e) City improve and widen approaches to conform with raised siding and widened crossing. City paint pavement markings.

Snyder Avenue Crossing No. B-361.1

The Snyder Avenue crossing is a narrow (14' 6") crossing with approximately an 18 per cent approach grade on the north side of the main line tracks. The crossing and approaches are in

extremely poor condition. The vehicular traffic is only 70 vehicles per day.

In view of the hazardous conditions at this crossing it should be closed to vehicular traffic.

Recommendations

Southern Pacific physically close and barricade Snyder Avenue Crossing No. B-361.1 to vehicular traffic.

On cross-examination, the staff engineer testified that a grade of 7 per cent between the north side track at Hayes Street and the main tracks would be acceptable. He also said that there are five tracks at Hayes Street and only three at Snyder Avenue and that at Snyder Avenue view conditions are better. He qualified this latter statement by saying that at Snyder Avenue the side track is used for car storage. The witness further stated that Hayes Street is a better street than Snyder Avenue to remain open in that "H" Street, the first street north of and parallel to the rail lines, would require widening at Snyder Avenue, new approaches would be required at Snyder Avenue, and the side track at Snyder Avenue would require more raising. The witness said if gates are installed at Snyder Avenue, it would definitely be a safer crossing than Hayes Street.

A Senior Assistant Division Engineer for the Southern Pacific testified that if the spur track on the north side of the main tracks at the Hayes Street crossing is raised $5\frac{1}{2}$ inches, the resulting grades of approach on both sides of the main tracks will be 7 per cent.

The Southern Pacific Public Projects engineer testified that in his opinion Snyder Avenue is a more logical crossing than Hayes Street and that if Snyder Avenue is used as the point of crossing, it should be relocated to form a straight street across U. S. Highway 466.

The costs of improving the crossings with gates as suggested by the staff engineer were estimated to total approximately \$44,000 for whichever two crossings remain open.

Findings

The Commission finds that:

1. The Southern Pacific has a line extending from Bakersfield to Mojave going through the City in an east-west direction. U. S. Highway 466 (State Highway 58) is parallel to the right of way and approximately 100 feet south thereof. "H" Street is parallel to the right of way and approximately 100 feet north thereof. North Green Street, Hayes Street and Snyder Avenue cross the right of way at approximately 90° angles. North Green Street is approximately 2,500 feet west of Hayes Street. Hayes Street is approximately 800 feet west of Snyder Avenue. Each street extends between U. S. Highway 466 (State Highway 58) and "H" Street and the three cross-streets are the only ones in the area which cross the tracks.

2. At each crossing herein considered there is a total of six passenger train movements per day and there is an average of approximately 50 freight train movements per day. The authorized speed of passenger trains is 79 miles per hour eastbound and 25 miles per hour westbound. The authorized speed of freight trains is 60 miles per hour eastbound and 25 miles per hour westbound.

3. At the North Green Street crossing there are two main line and one house track. The width of the crossing is 64 feet. The grades of approach are 3 per cent ascending in each direction. The view conditions from both the southwest and southeast quadrants are obstructed and approximately 1,400 motor vehicles use the crossing each 24 hours. Since September 11, 1928, there have been eight accidents at this crossing in which five persons have been injured. The crossing is protected with two Standard No. 8 flashing light signals with two-train indicators and reflectorized advanced warning signs.

4. At the Hayes Street crossing there are two main line tracks, one side track, and two spur tracks. The width of the crossing is 18 feet. The grade of approach from the south is approximately 10 per cent ascending and from the north approximately 15 per cent ascending. The view conditions are obstructed in all directions but the southeast quadrant. Approximately 644 vehicles use this crossing each 24 hours and the crossing is protected with two Standard No. 1 crossing signs and two reflectorized advance warning signs. Since September 26, 1935, there have been six accidents at this crossing in which no one was killed or injured.

5. At Snyder Avenue there are two main line and one side tracks. The width of the crossing is 14 feet 6 inches. The grade of the approach is approximately 18 per cent ascending from the north and approximately 4 per cent ascending from the south. Across the right of way Snyder Avenue is approximately 100 feet east of Snyder Avenue south of U. S. Highway 466. The view

conditions at this crossing are unobstructed in all four quadrants except that when the side track is used for the storage the north-west quadrant is obstructed. Approximately 70 vehicles use this crossing each 24 hours. The crossing is protected by two Standard No. 1 crossing signs and two reflectorized advance warning signs. Since December 24, 1954, there has been one accident at the crossing in which no one was killed or injured.

6. Public health, safety and welfare require that North Green Street be protected as set out in the order herein; that the Hayes Street crossing be closed and barricaded; that Snyder Avenue be relocated so that it extends across the track in a direct line with existing Snyder Avenue south of U. S. Highway 466; that it be widened to the same width as the existing Snyder Avenue south of said highway; and that the grades of approach and protection be as set out in the order herein.

7. The costs of widening and relocating Snyder Avenue and the costs of installation of automatic protection at North Green Street and at Snyder Avenue shall be divided as specified in the order herein.

8. The allocation of the costs of maintaining protective devices at each crossing herein considered should be deferred until further order of this Commission.

Conclusion

The Commission concludes that the crossings of the Southern Pacific Company tracks at North Green Street and at relocated Snyder Avenue should be protected as specified in the order herein; that the Hayes Street crossing and the existing

Snyder Avenue crossing should be closed and barricaded; that the Snyder Avenue crossing should be relocated as set out in the order herein; that the Snyder Avenue crossing should be widened and grades of approach changed as set out in the order herein, and that the allocation of maintenance costs of protection at each crossing should be deferred.

O R D E R

IT IS ORDERED that:

1. The Southern Pacific Company shall replace the existing protection at the North Green Street crossing (Crossing No. B-360.5) with two Standard No. 8 flashing light signals, supplemented with automatic gate arms with predictor circuits. The costs of the improved protection shall be divided 50 per cent to the City of Tehachapi and 50 per cent to the Southern Pacific Company.
2. The Southern Pacific Company shall, at its expense, physically close and barricade the Hayes Street crossing (Crossing No. B-360.9) and the existing Snyder Avenue crossing (Crossing No. B-361.1) to vehicular traffic, upon completion and opening to traffic of the relocated Snyder Avenue crossing ordered in paragraph 3.
3. The City of Tehachapi and/or the Southern Pacific Company shall relocate Snyder Avenue crossing so that it is approximately directly north of and a continuance of Snyder Avenue as it exists south of U.S. Highway 466 (State Highway 58) and extend it to an intersection with "H" Street. The width of the crossing of relocated

Snyder Avenue shall be not less than 24 feet and grades of approach not greater than 6 per cent. The angle of crossing shall be 90°. The Southern Pacific Company shall, at its expense, raise the siding at the new crossing to the approximate level of the main tracks. The Southern Pacific Company shall, at its expense, improve tracks and subgrade and pave the crossing within lines two feet outside the rails. Construction shall be equal or superior to Standard No. 2 of General Order No. 72 with tops of rails flush with the roadway. The City of Tehachapi shall pave the new Snyder Avenue approaches between "K" Street and lines two feet outside the rails and between U.S. Highway 466 and lines two feet outside the rails at its own expense. Construction and width shall conform to the railroad's construction of Snyder Avenue. Protection shall be by two Standard No. 8 flashing light signals supplemented with automatic gate arms with predictor circuits. The costs of the protection and the installation thereof shall be apportioned 50 per cent to the City of Tehachapi and 50 per cent to the Southern Pacific Company. The relocated Snyder Avenue crossing shall be identified as B-361.0.

4. The allocation of maintenance costs at each crossing shall be deferred until further order of this Commission.

5. Within thirty days after completion of the work hereinabove ordered, the Southern Pacific Company and/or the City of Tehachapi shall notify the Commission in writing of the compliance with the conditions hereof.

6. The improvements herein provided for and the barricading of Hayes Street are to be completed within one year from the effective date of this order.

The effective date of this order shall be twenty days after the date hereof.

Dated at San Francisco, California, this 10th day of August, 1965.

Frederick B. Halabett
President
Robert E. Hill
Augusta
William W. Berwick

Commissioner George G. Grover, being necessarily absent, did not participate in the disposition of this order.