Decision No. 69896

## ORIGINAL

BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF CALIFORNIA

Investigation into the status, safety, maintenance, use and protection or closing of the crossing at grade of the lines of the PACIFIC ELECTRIC RAILWAY COMPANY in the City of Stanton, California, with Western Avenue; Crossing No. 6NC-25.14-C.

Case No. 8111 (Filed Jamuary 12, 1965)

Randolph Karr and Walt A. Steiger, by

Randolph Karr, for Pacific Electric

Railway Company, and Fred D. Johnston
and E. M. Herrell, for the City of
Stanton, respondents.

Elmer Sjostrom, for the Commission staff.

## OPINION

A public hearing on the above-entitled matter was held before Commissioner Grover and Examiner Patterson in Santa Ana on May 12 and 13, 1965. The matter was heard on a consolidated record with Cases Nos. 8103 and 8105 involving Pacific Electric Railway crossings in the City of Kuntington Beach and the City of Santa Ana, respectively. All three matters were submitted on May 13, 1965, and separate decisions will be rendered in each.

Another matter, Case No. 8104, involving two crossings of the Southern Pacific Company in the County of Orange, was continued to a date to be set, upon statements of counsel that agreement had been reached between Southern Pacific Company and the County of Orange to install automatic gates at the two crossings.

Investigation herein concerns the crossing at grade of Western Avenue with the Los Alamitos branch line track of the Pacific Electric Railway Company in the City of Stanton, (Crossing No. 6NC-25.14-C). The investigation was instituted to determine whether or not public health, safety and welfare require the relocation, widening, closing or other alteration of the crossing; the installation and maintenance of additional or improved protective devices at the crossing; and, if any changes are made, on what terms the work should be done and how the cost should be apportioned.

An Associate Transportation Engineer of the Commission staff prepared and presented a report (Exhibit 1) covering his analysis and recommendations for improved protection at the three Pacific Electric Railway Company crossings. His evidence concerning the Western Avenue crossing may be summarized as follows: The crossing consists of a single branch line track at a 90 degree angle with Western Avenue which runs north and south. Width of the crossing and approaches is 22 feet. Visibility is impaired for vehicle drivers proceeding either north or south by residences on the west side of Western Avenue. At a distance of 100 feet from the track a driver of a southbound vehicle has a visibility of 30 feet to his right and a driver of a northbound vehicle has a visibility of 60 feet to his left. During a three-hour traffic check commencing at 2:30 p.m. on Wednesday, March 3, 1965, the staff engineer counted 1,110 vehicles using the crossing including 18 school buses, some of which did not contain pupils. The posted speed for automobiles

is 35 miles per hour. The traffic check made by the City of Stanton estimated total daily traffic over the crossing of 7,060 vehicles per day. The train traffic consists of one round trip per day plus switching as required in connection with service on the Stanton-Huntington Beach branch by means of the "Y" track which exists immediately east and south of the crossing. The land between the "Y" track and Western Avenue is presently undeveloped but construction of a condominium is planned in the area.

There have been no accidents reported at the crossing since January 1, 1960. Present protection consists of two Standard No. 1 reflectorized crossing signs with two reflectorized advance warning signs.

based on the use of the crossing by approximately 7,000 vehicles per day, the allowable speed of such vehicles, the restricted visibility in two quadrants and the regular use of the crossing by trains, including switching movements, the staff engineer concluded that better protection than that presently provided is needed. He recommended that there be installed two Standard No. 8 flashing light signals supplemented with automatic gates, the installation cost to be apportioned 50-50 between the Railway and the City. He recommended the use of automatic gates rather than flashing lights alone because installations with automatic gates have proven superior. In this regard a report he had prepared dated October 1, 1964, entitled "Effectiveness of Automatic Crossing Gates in Southern California, 1954 through 1963" was introduced (Exhibit 2). This report, which was a

study of accident experience over a ten-year period at 132 points in Southern California where automatic crossing gates were in place on December 31, 1963, shows that of the 101 installations where crossing protection had been upgraded to automatic gates, accidents have been decreased by 57 per cent, deaths decreased by 89 per cent and injuries decreased by 88 per cent.

Since the paved section of the crossing is only 22 feet wide as compared with a roadway width of about 42 feet and since there are certain other physical features which impair use of the crossing, the staff engineer made the following additional recommendations:

- 1. Widen the crossing within the Railway's right of way to 42 feet to conform with the adjacent street width, 100 per cent of the cost thereof to be borne by the City, except that the Railway should pay 100 per cent of the cost to prepare its track area to receive paving.
- 2. Relocate two poles in the parkway immediately north of the track on the west side of the street, and remove the young tree from the same area, the cost thereof to be borne 100 per cent by the City.
- 3. Construct sidewalk over the Railway's right of way connecting the present sidewalks north and south thereof, cost to be borne 100 per cent by the City, except that the Railway should pay 100 per cent of the cost to prepare its track area to receive the sidewalk.

A Public Projects Engineer for the Railway testified that in recent years significant improvements have been made in equipment and techniques for crossing protection. He stated that in the early stages of crossing protection it was considered necessary only to warn motorists of the presence of the track and for many years a signal device such as a crossing sign or a crossing sign augmented with flashing lights was deemed sufficient. He stated, however, that as the volume and speed of motor vehicle travel have increased this type of protection has become less adequate so that the presence of a positive barrier to the motorist, it now has been concluded, is the best crossing protection available, except for grade separation, and that lesser types of automatic protection are not economically justified. He stated that, in his opinion the installation of flashing lights without crossing gates would provide little or no protection over the presently installed Standard No. 1 crossing signs. He indicated that the accident hazard at the Western Avenue crossing is accentuated by the switching movements which are made regularly by means of the adjacent 'Y' track.

The installation proposed by the Railway at this crossing would include a Marquardt GCP Control Predictor. Predictors such as this, which have been in general use for about three years have made the installation of automatic gates, particularly at crossings where switching is performed, much more feasible than in the past, as the predictor eliminates unnecessary operation of the gates.

A Maintenance and Construction Engineer for the Railway presented in Exhibit 5 estimates of costs for upgrading the crossing protection. His estimate for installation of two Standard No. 8 flashing lights with Marquardt GCP control is \$14,235 with an annual maintenance cost of \$644. If automatic gates are added to the installation, the total cost is estimated to be \$19,985 with an annual maintenance cost of \$868. He gave an approximate estimate that if the predictor control were to be eliminated from either installation the cost would be reduced by an amount of \$4,500 to \$5,000.

The City of Stanton takes the position that the installation of Standard No. 8 flashing lights is the only additional protection needed at this crossing. The City engineer testified that it would not be practical to install automatic gates at this time as Western Avenue under the County's master plan, which has been adopted by the City of Stanton, will ultimately be widened to a paving width of 64 feet. He could not state when such widening would take place but indicated that it would probably be when the property to the east of Western Avenue is developed. His belief that flashing lights would improve significantly the protection at the crossing was based upon his understanding of a study made by the County of Los Angeles in 1958 in which it was concluded, as he recalled, that No.8-flashing lights would reduce accident rates by 71 per cent. He also made reference to a new study being made by the County of Los Angeles

which is in the draft stage and has not been released. He stated that there had been only one accident reported at the crossing and that was in December 1934. He also testified that in considering the economics of the protection afforded, consideration should be given to the many minor accidents which occur where vehicles strike the crossing gates. The record shows that such accidents seldom result in any injuries and that only property damage results. He stated that the area surrounding the crossing is growing rapidly and that the traffic on Western Avenue will undoubtedly increase in the future.

Based upon the evidence of heavy volume of vehicular traffic carried by Western Avenue, which traffic will increase in the future, the regular train movements of one round trip per day plus required switching over the "Y" track, the restricted visibility for motorists in two quadrants, the use of the crossing by school buses, and the rapid development the surrounding area is experiencing, the Commission finds that the protection provided at the crossing is inadequate.

The Commission also finds that the staff recommendations pertaining to improving the crossing and relocating certain physical features so as to improve the visibility are reasonable, and further finds that public health, safety and welfare require that the crossing be protected by two Standard No. 8 flashing light signals supplemented with automatic gates equipped with predictor controls and that the cost of the installation should be apportioned 50 percent to the City and 50 percent to the Railway. The Commission concludes that such additional protection should be ordered, with the cost of installation apportioned as hereinafter provided.

Pacific Electric Railway Company shall pay 100 percent of the cost to prepare its track area to receive the sidewalk.

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

		NOVEMBER -	San Francisco	, California,	this	<u> Ind</u>
day	of	(10.1-	, 1965.			