

Inv-2166

INTERSTATE COMMERCE COMMISSION

WASHINGTON

REPORT OF THE DIRECTOR

BUREAU OF SAFETY

ACCIDENT ON THE

COLORADO & SOUTHERN RAILWAY

ROYCE, N. MEXICO

MARCH 26, 1937

INVESTIGATION NO. 2166

-2-

SUMMARY

Inv. 2166

Railroad:	Colorado & Southern
Date:	March 26, 1937
Location:	Royce, N. M.
Kind of accident:	Head-end collision
Trains involved:	Freight : Passenger
Train numbers:	Extra 902 : No. 2
Engine numbers:	902 : C.B. & Q. 2959
Consist:	25 cars and : 3 cars caboose
Speed:	12 to 15 miles : 60 m.p.h per hour :
Track:	Tangent : 1.01 percent : ascending grade
Weather:	Clear
Time:	10:52 p.m.
Casualties:	1 killed and 22 injured
Cause:	Failure of passenger train to obey wait order; failure of inferior train to clear the time of an opposing superior train.

April 27, 1937.

To the Commission:

On March 26, 1937, there was a head-end collision between a passenger train and a freight train on the Colorado and Southern Railway near Royce, N. M., which resulted in the death of one employee and the injury of sixteen passengers, five employees, and one Pullman porter.

Location and method of operation

The accident occurred on that part of the Southern Division extending between Trinidad, Colo., and Sixela, N. M., a distance of 134.5 miles. This is a single track line over which trains are operated by time-table and train orders, and a manual block system for following trains only. Time-table directions are north and south and these directions are used in this report. The passing track at Royce is 3,018 feet in length and parallels the main track on the east; the accident occurred at a point 2,297 feet north of the north switch of the passing track. Approaching this point from the north the track is tangent for several miles, then there is a 30' curve to the left 1,553 feet long followed by 4,653 feet of tangent track upon which, at a point 1,172 feet from the southern end, the accident occurred. Approaching from the south the track is tangent for several miles followed by a 30' curve to the left 1,184 feet long, and then the tangent upon which the accident occurred. In the vicinity of the point of accident the grade is 1.01 percent descending for south-bound trains.

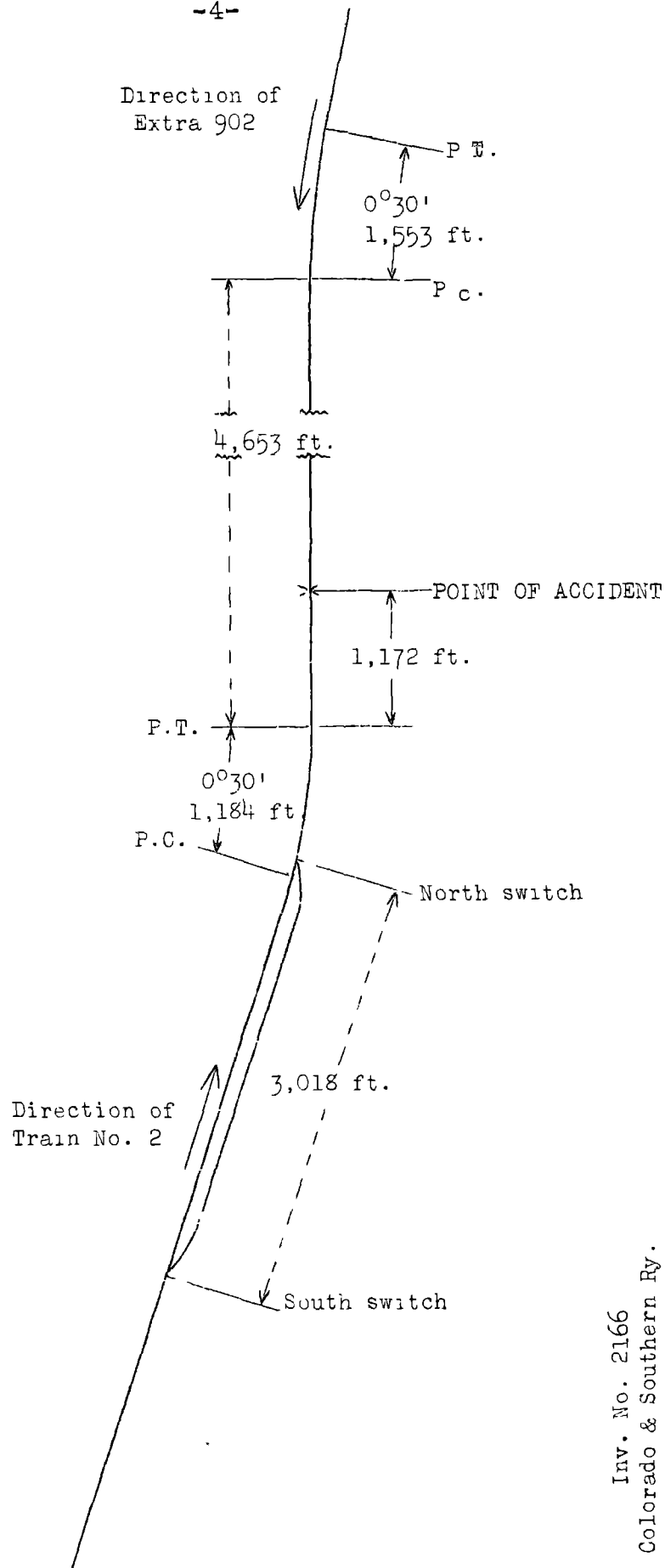
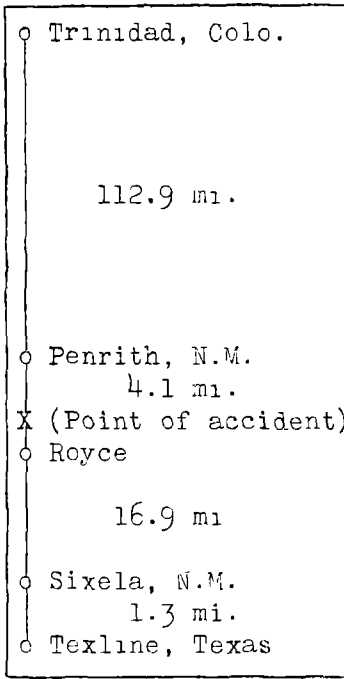
The weather was clear at the time of the accident which occurred at 10:52 p.m.

Description

Northbound passenger train No. 2 consisted of one baggage car with steel underframe and sheathing, one all steel coach, and one all steel Pullman sleeping car, in the order named, hauled by C.B. & Q. engine 2959, and was in charge of Conductor Bosbyshell and Engineman Horan. This crew took charge of the train at Texline, Texas, where they received a clearance card, and form 31, order No. 45, reading:

"No. 2 wait at Royce until 10:55 p.m.
Penrith until 11:02 p.m. Mt. Dora until
11:10 p.m. for Extra 902 south".

This train departed from Texline at 10:03 p.m., on time, passed Clayton, the last open office 8.1 miles south of Royce



Inv. No. 2166
Colorado & Southern Ry.
Royce, New Mexico
March 26, 1937

at 10:38 p.m., according to the train sheet 11 minutes late, and while running at a speed of 60 miles per hour, as shown by the recording tape on engine 2959, collided with Extra 902 at a point about 2,297 feet north of the north passing-track switch at Royce, at 10:52 p.m.

Southbound freight train Extra 902, consisting of 15 loads, 10 empties and a caboose, hauled by engine 902 and in charge of Engineman Cary and Conductor Reilly, departed from Trinidad at 7:25 p.m. in possession of a form "C" permissive card, a form "A" clearance card and a copy of train order No. 45, cited above, passed Penrith, 4.1 miles from Royce, at 10:45 p.m., and collided with train No. 2 at 10:52 p.m., while running at an estimated speed of 12 to 15 miles per hour.

Both engines were derailed but remained upright close to and parallel with the rails, with the smoke box of engine 902 telescoped nearly its entire length. The trucks and underframe of the tender of engine 2959 were demolished, and the front end of the cistern telescoped the engine cab, while the rear end telescoped the baggage car. The remaining cars of train No. 2 remained on the track and were undamaged. The tender of engine 902 partially telescoped the cab of the engine but remained upright and parallel with the track. The head car stopped with the head end on top of the tender of engine 902, and the rear end off the truck and some distance to the west of the track; the second car stopped with the head end on top of the first car, and the rear end in line with the track; the third car lay on its side to the west of the roadbed. The fourth car was thrown off its trucks, and the head truck of the fifth car was derailed. The employee killed was the engineman of train No. 2. The employees injured were the conductor and fireman of train No. 2, and the fireman, head brakeman and engineman of Extra 902.

Summary of evidence

Fireman Greenwade of train No. 2, stated that prior to leaving Texline he compared his watch with a standard clock and found his watch showing the correct time. He read and understood order No. 45 which was delivered to Engineman Horan at Texline. Engineman Horan appeared to be in normal condition. Fireman Greenwade stated that nearing Royce he was working on the fire and when he got on the seatbox he noticed a headlight, and a switch light which at first he thought was the light at the south passing-track switch. However he soon realized that this light was at the north switch and he immediately called a warning to the engineman and prepared to dismount. Shortly after calling the warning he heard the engineman make an emergency application of the brakes; at that time they were in

the vicinity of the north passing track switch and were moving at a speed of about 50 miles per hour. He stated that because of the curves it is difficult to locate a headlight in the vicinity of Royce, and that approaching that station, Engineman Horan had not sounded either the waiting-point or the station whistle signal. The weather was clear at the time of collision.

Conductor Bosbyshell of train No. 2 stated that before leaving Texline he compared his watch with a standard clock and found his watch 10 seconds fast. At Texline copies of order 45 were delivered by the operator to both himself and Engineman Horan but neither he nor Engineman Horan read the order to each other or to the operator, and he had no conversation with Engineman Horan, but the latter seemed to be in normal condition. The air brakes were tested before leaving Texline and functioned properly en route. After leaving Clayton he did not hear any whistle signal and did not realize that his train was passing Royce until he noticed an adjoining track; he noted that it was only 10:51 p.m., and immediately reached for the conductor's valve but felt an emergency application of the brakes before his action was completed. The collision occurred almost immediately thereafter, at which time the speed was about 50 miles per hour. He stated that he does not read form 31 orders aloud to the operator who delivers them.

The statement of Brakeman Martin of train No. 2 corroborated that of Conductor Bosbyshell and contained the additional information that the lights on both the north and south switches of the passing track at Royce were burning after the collision.

Engineman Cary of Extra 902 stated that before leaving Trinidad he compared his watch with a standard clock and found his time 10 seconds slow; at this point he received order No. 45, and understood its contents. His train passed Penrith at 10:45 p.m., and as the rules required that extra trains must clear the time of opposing regular trains at least five minutes, he realized that he was on short time but figured that the engine would be at the north switch at Royce at 10:50 p.m., after which they would have five minutes to protect the train. As he neared Royce he could see No. 2 approaching that station at a high rate of speed, and he made a light service application of the brakes; when he realized that train No. 2 was by the north switch he placed the brake valve in emergency position and had reduced the speed of his train to about 10 or 12 miles per hour at the time of collision. His headlight was in good condition and burning brightly.

Conductor Reilly of Extra 902, stated that he compared his watch with a standard clock before leaving Trinidad and

found his watch 15 seconds fast; he received order No. 45 at Trinidad. His train passed Penrith at 10:45 p.m. and he realized that they were on short time, but felt that after their arrival at Royce there would still be sufficient time to give the train proper protection, and to get into the siding before the expiration of the wait order. He stated that the air-brakes had been tested before leaving Trinidad.

Head Brakeman Holloway of Extra 902 corroborated the statement of Engineman Cary, and the statement of Rear Brakeman of Extra 902 corroborated that of Conductor Reilly.

Discussion

Rule 210 of the Book of Rules, relative to 31 orders, requires all persons to whom the order is addressed, except enginemen, to read it to the operator and then sign it; the copy for the engineman of a passenger train must be delivered to him personally by the conductor and the engineman must read the order to the conductor before proceeding. The investigation discloses that when order No. 45 was delivered to the crew of Train No. 2 at Texline, none of these provisions was complied with. The operator personally delivered a copy of the order to the conductor and also to the engineman and the order was not read aloud by any of these employees.

Further instructions in the book of rules relative to the form of wait order held by the trains involved read:

"The train first named must not pass the designated point before the time given, unless the other train has arrived. The train last named is required to run with respect to the time specified, at the designated point or any intermediate station where the schedule time is earlier than the time specified in the order, as before required to run with respect to the schedule time of the train first named."

The rules also provide that extra trains must clear the time of opposing regular trains not less than five minutes unless otherwise provided; that engineman must give the meeting or waiting point whistle-signal at least one mile before reaching a meeting or waiting point and upon his failure to do this, the conductor must take immediate action to stop the train. The engineman of Train No. 2 failed to give the meeting-point whistle signal approaching Royce but the conductor of that train took no action to stop the train until it was passing the siding

at which his train was to wait.

The authorized speed for passenger trains in this territory is 60 miles per hour and for freight trains it is 45 miles per hour. The crew of Extra 902 understood the requirement of the rules relative to extra trains clearing the time of opposing regular trains and they knew when they left Penrith at 10:45 p.m. that they would be unable to reach Royce, 4.1 miles distant, and clear that train as required by rule and at the same time comply with the speed restrictions, yet they proceeded notwithstanding these circumstances. The reason why the engineman of Train No. 2 failed to comply with the wait order is not known as he was killed in the collision.

The general failure to comply with rules which was disclosed by this investigation indicates that lax operating practices have developed through inadequate supervision and call for prompt corrective measures by responsible officers of this company.

While there was a manual block system in use on this line, it applied only to trains being operated in the same direction. Had an adequate block system for both following and opposing movements been in service, it is reasonable to assume that this accident would have been prevented.

Conclusion

This accident was caused by failure to obey a wait order; a contributing cause was the failure of an extra train to clear the time of an opposing train as required by rule.

Respectfully submitted,

W. J. PATTERSON,
Director.