

IN RE INVESTIGATION OF AN ACCIDENT WHICH OCCURRED ON THE
DENVER & RIO GRANDE RAILROAD AT MAXWELL, UTAH,
ON SEPTEMBER 15, 1917.

On September 15, 1917, there was a head-end collision between a passenger train and a troop train on the Denver & Rio Grande Railroad at Maxwell, Utah, which resulted in injury to 15 passengers, 54 soldiers and 1 employee. After investigation of this accident, the Chief of the Division of Safety reports as follows:

The Green River Division, on which this accident occurred, is a single-track line, over which train movements are governed by time-table and train orders, no block signal system being in use. The collision occurred on the main line between the passing track switches at Maxwell, -- 2,673 feet from the west switch and 1,650 feet from the east switch. Approaching the point of collision from the west, there is a 1-degree curve to the left, followed by 231 feet of tangent track, while approaching from the east the track is straight for about 3,300 feet. The grade at the point of accident is slightly ascending for west-bound trains. At the time of the accident the weather was clear.

Westbound troop train second No. 5, consisting of locomotive 792, 1 baggage car and 5 coaches in charge of Conductor Young and Engineman Carpenter, left Greenville, Utah, at 11:47 a. m., with train order No. 59, reading as follows:

"First and Second No. 5, engines No. 787 and No. 792 have right over No. 18, Price to Helper."

Train second No. 5 arrived at Price, Utah at 1:39 p. m. and there received train order No. 77 which fixed a positive meeting point with train No. 18 at Maxwell, a station 2.7 miles west of Price and the only station between Price and Helper. This order read as follows:

"Order No. 76 is annulled. Second No. 5, engine 792 meet No. 18, engine 783 at Maxwell."

Order No. 76, referred to in order No. 77 was not delivered to either of the trains involved in this accident.

The crew of train second No. 5 expected the right of track to Helper in accordance with order No. 59, but upon arrival at Maxwell at 1:50 p. m. discovered train No. 18 holding the main line. The brakes were immediately applied in emergency and while running at a speed of about 5 miles an hour it collided with train No. 18.

Eastbound passenger train No. 18, consisting of locomotive 783, 1 baggage car and 2 coaches, was in charge of Conductor Winslow and Engineman Sherner. At 1:25 p. m. this train arrived at Helper, Utah, 4.7 miles west of Maxwell, where the conductor received a clearance card and train orders Nos. 59 and 77, quoted above. The conductor and engineman failed to read these orders to each other and compare them with the clearance card, and received the impression that order No. 77 annulled order No. 59 instead of order No. 76. They left Helper at 1:35 p. m. with the understanding that they had the right to the main line at Maxwell. Their train was the first to arrive at Maxwell and stopped on the main line between the switches of the passing track. When it was seen that train second No. 5 was not going to stop to take the siding, the engineman of train No. 18 attempted to back up but the collision occurred before he could do so.

None of the cars were derailed as a result of the collision and only slight damage was sustained by any of the equipment. The sudden application of the air on train second No. 5 caused the coupler to be pulled out of the forward end of the head coach, the shock being what caused the injuries to the soldiers on this train, while the force of the impact of the two locomotives was what caused the injuries to the passengers on train No. 18.

Engineman Carpenter, of train second No. 5, stated that according to train order No. 59, which he held, his train had the right of track from Price to Helper and that train No. 18 was required to take the siding at Maxwell for them. He said that when he first discovered train No. 18 on the main track, his train was about 6 coach lengths away and that the speed of his train was about 30 miles an hour. He at once shut off the engine and applied the air brakes, the fireman then opening the sand throttle, and the speed of his train was reduced so that at the time of the collision it was about 5 miles an hour.

Fireman Morgan, of train second No. 5, stated that he was standing in the gangway of the locomotive when he first saw train No. 18 and at that time thought it was on the passing siding. When he discovered that they were on the main line the two trains were about 6 or 7 telegraph poles apart and he believes that he called out to the engineman who shut off the engine and applied the brakes in emergency, while he opened the sand throttle. He further stated that he read the orders as he invariably does, and that he expected that train No. 18

would take the siding at Maxwell in compliance with train order No. 59.

Superintendent Ten Eyck stated that he was riding on the locomotive of train second No. 5 at the time of the collision, for the purpose of looking over some track which had just been repaired. He was riding on the fireman's side and when about 6 or 7 car lengths beyond the last switch at Maxwell, he noticed the pilot of the locomotive of train No. 18 coming around the curve. His first glimpse gave him the impression that train No. 18 was on the siding but upon looking again saw that it was on the main line and he called out to the engineer to slow down the train. He then stepped off the locomotive before the collision occurred. He further stated that he did not know what orders were held by the crew of train second No. 5.

Conductor Winslow, of train No. 18, stated that when his train arrived at Helper at 1:45 p. m., he went into the office, registered and received copies of train order No. 59 which gave train second No. 5 the right of track over his train from Helper to Helper. He read this order and signed for it. The dispatcher then came to him and asked him how soon he would be able to leave Helper to which he replied that he could leave by 1:45 p. m. The dispatcher then told him that in that case he would change order No. 59 and give him a meet order with train second No. 5. He was handed copies of train order No. 77, which annulled order No. 76 and named Maxwell as the meeting point between his train and train second No. 5, the dispatcher telling him that train second No. 5 would be at Maxwell waiting for them. Conductor Winslow stated that on the impulse of the moment, without again looking at the number on train order No. 59, he thought that train order No. 77 annulled the right-of-track order--No. 59--instead of train order No. 76, which he had not seen at all. He said that ordinarily before leaving on a fire with orders he checks them against the clearance card, making a check mark over each number, but being in a hurry on this occasion, he failed to do so. He separated his copies of the orders from his engineer's set and handed the engineer's to him as he was going down the stairs to his train, saying to the engineer, "They have annulled that right-of-track order, we meet at Maxwell." He then hurried to the baggage car without having the engineer read the orders to him as required by the rule. At 1:35 p. m. his train started from Helper; approaching Maxwell he was collecting tickets when the engineer sounded the whistle for Maxwell. He signaled him to stop at the next station and the engineer answered with one long blast of the whistle. The conductor stated that he heard the train go over the next switch at Maxwell but thinking his train had the right to main track, he continued collecting tickets. He heard the whistle for brakes, the collision occurring an instant later. Conductor Winslow stated further that after the accident he compared orders with the crew of train second No. 5 and admitted that the mistake was on himself.

Engineman Shermer, of train No. 18, stated that when his conductor gave him his set of orders at Helper, he told him that the right-of-track order was annulled and that they were to meet train second No. 5 at Maxwell. The engineman said that the conductor then hurried away and, as was customary when in a hurry, they did not read and compare the orders with each other. Engineman Shermer read these orders over to himself but stated that he did not stop to look at the number of the right-of-track order, as he had gathered from the conductor's remark that the order had been annulled, and that train second No. 5 would wait on the siding. He admitted that he violated the rules by not reading the orders to the conductor and also by failing to check them against the clearance card. After reading the orders he handed them to the fireman who read them aloud but made no comment regarding them. Upon arrival at Maxwell, thinking that his train could hold the main track, he did not take the siding and when about half-way between the passing track switches saw the smoke of train second No. 5 and thought it was heading in on the siding at the west switch. When he got around the curve and saw the opposing train was on the main line just east of the west switch, he stopped his train and tried to back up but could not get the train started before the collision occurred.

Fireman Baggs, of train No. 18, stated that when the engineman handed the orders to him at Helper, he said, "Right-of-track order annulled and we meet them at Maxwell." He read the orders, not noticing the numbers on them, and received the impression that the right-of-track order had been annulled and that his train would therefore hold the main track at Maxwell. He stated that he was on the left side of the locomotive looking out of the window when he first discovered that train second No. 5 was not taking the siding and called to the engineman, "Those fellows are going to hit us." He then got down on the step and jumped off the locomotive just before the collision occurred.

Brakeman Guyon, of train No. 18, stated that he did not see the orders which the conductor received at Helper, but that the conductor told him that they would meet train second No. 5 at Maxwell. Not having read the orders over he supposed that the conductor knew what he was about and as he was busy with other duties, he did not ask the conductor for them.

This accident was caused by the failure of the conductor and engineman of train No. 18 to read their orders to each other and compare them with the clearance card, resulting in their failure to take the siding at Maxwell for train second No. 5, which train, according to train order No. 59, had the right of track.

Rule No. 210 reads in part as follows:

"Those to whom the order is addressed, except engineers, must read it aloud to the operator, and then sign it, * * * * *. The copy for each engineer, with a clearance card, must be delivered to him personally by the conductor. The engineer must read the order aloud to the conductor and understand it before acting upon it. While the engineer is reading the order the conductor must compare it with his own copy.

"Engineers must show their train orders to firemen and head brakemen, and conductors to their rear brakemen or flagmen, who are required to read and understand them. Passenger conductors will show all train orders to head brakemen and train porters. Brakemen, firemen, flagmen and train porters will call the attention of conductors and engineers should orders be disregarded."

Had this rule been fully complied with, either Engineman Shermer or Brakeman Guyon may have discovered the conductor's error in his understanding that train order No. 59 had been annulled and the accident might thereby have been averted.

Conductor Winslow entered the service of the Denver & Rio Grande Railroad as brakeman in June, 1892, and was promoted to conductor in September, 1898. In January, 1905, he was discharged for responsibility in connection with a rear end collision, but in April, 1905, his sentence of dismissal was changed to read "suspension" for the time he had been off and he started work again. In November, 1905, he was appointed trainmaster from which position he resigned in June, 1906, and again assumed duties as passenger conductor. Engineman Shermer entered the service as fireman in December, 1879, and was promoted to engineman in July, 1880. His service record was good.

At the time of the accident Conductor Winslow had been on duty about three hours after a period of eighteen hours off duty, while Engineman Shermer had been on duty about six hours after a period off duty of about thirty-five hours.