

IN RE INVESTIGATION OF AN ACCIDENT WHICH OCCURRED - 25
 ON THE CLEVELAND, CINCINNATI, CHICAGO & ST. LOUIS 25
 RAILWAY NEAR ROCHESTER, OHIO, ON JUNE 6, 1918. - 22

August 3, 1918.

On June 6, 1918, there was a derailment of a freight train on the Cleveland, Cincinnati, Chicago & St. Louis Railway near Rochester, Ohio, which resulted in the death of 2 employees. After investigation the Chief of the Bureau of Safety reports as follows:

That part of the Cleveland Division of the Cleveland, Cincinnati, Chicago & St. Louis Railway, upon which this accident occurred, is a double-track line over which trains are operated by time table, train order and a nonautomatic block system. The track in this vicinity is laid with 90- pound steel rails, 33 feet in length, with twenty oak ties under each rail and about 8 inches of crushed stone ballast. The rails are joined by six-hole angle bars and a few tie plates are in use. At the place of derailment, the track is on a fill of about six feet.

Eastbound extra 6715, consisting of locomotive 6715, 42 cars and 2 cabooses, left Bellefontaine, Ohio, at 11.08 p.m., June 5, in charge of Conductor Hartlieb and Engineman Miller and was en route to Lyndale, Ohio. Upon arrival at Galion, Ohio, 60.9 miles east of Bellefontaine, at 3.52 a.m., June 6, the 42 cars were set off and 67 other cars picked up, and the train left Galion at 7.55 a.m., passed Rochester, 37.8

miles east of Gallien, at 9.34 a.m., and was derailed at a point about $1\frac{1}{2}$ miles east of Rochester about 9.36 while running at a speed of about 30 miles an hour.

Sixteen cars immediately ahead of the two cabooses and three cars on the rear end of the train were derailed. Eight of these cars lay on their sides to the right of the eastbound track, one car lay on its side to the left of the westbound track, two other cars lay on their sides with their head ends clear of the westbound track, but with their rear ends fouling that track. One car stopped crosswise the westbound track, off its trucks, but remained upright. The conductor and rear brakeman were killed.

The first mark of the derailment was found on a tie about 850 feet east of Mile Post 41 and was about 8 inches outside of the south rail of the eastbound track and had the appearance of having been caused by a journal box bolt. From this point similar marks were found on the outer end of the ties for a distance of about 25 feet. There were no other marks for a distance of 10 feet, but on a tie at this point there were marks where a wheel had left the rails to the south, and about 8 feet farther east there were marks indicating where another pair of wheels had left the track to the south. These wheel marks gradually worked to the south for a distance of about 50 feet. From this point the track was torn up for a distance of about 375 feet, and 20 rails and 227 new ties were

used in repairing the eastbound track and 1 new rail was used in repairing the westbound track.

The track is straight for a distance of 6 miles west and 2 miles east of the point of accident and is laid on a descending grade of .35%. The weather at the time was clear.

Engineman Miller stated that after leaving Gallion his train made two stops and he looked back over the train several times and again just before reaching Rochester, but saw no indications of a hot box nor did he see any member of the train crew working on a hot box. He said the train was running at a speed of 20 or 30 miles an hour when the air brakes applied automatically, this being the first information he had that there was anything wrong with the train.

Fireman Hitsman stated that he looked back over the train several times but saw no indications of a hot box and the first he knew of the derailment was when the train broke in two and the brakes applied automatically.

Head Brakeman Sigler stated that when his train left Gallion he was riding on top of the train about six cars behind the engine, but did not see the conductor or rear brakeman on the rear end of the train nor could he remember receiving any signals from them. He said he had looked back toward the rear of the train before reaching Rochester, but did not think he looked back after leaving there, and as his train passed Rochester he said he saw the operator there, but could not

recall that he received any signal from him.

Section Foreman Standfield stated that he was working on the north side of the track about a half mile east of Rochester when extra 6715 passed him at a speed of 30 or 40 miles an hour and he saw smoke coming from under the south side of the train. He saw a man standing on top of a box car with a water can in his hand and another man climbing down the south side of that car, but he did not give them any signals for they were not looking toward him and from their actions he thought they knew there was a hot box on the train and were trying to cool it. When informed of the accident he went there and found a journal box in the wreckage partially buried in the dirt and when he dug it out it was so hot he could not hold it in his hand; he made a careful search but was unable to find the journal that had been in the journal box. He found the brass in the journal box broken in two and one of the wedges was lying about three or four car lengths behind the truck from which it came and was badly worn. In his opinion the accident was caused by the journal getting so hot that it broke off and dropped down, and the first marks on the ties were caused by the oil box dropping down and the oil box bolt coming in contact with them.

Assistant Wreck Foreman Arnold stated that when he arrived at the scene of accident there was a pair of wheels missing and from the position of the truck he was positive it

was the rear truck of Pennsylvania hopper car No. 187587, which was a 140,000-pound capacity car. In his opinion the accident was caused by a journal on the south side of this car getting so hot that it broke off.

Sectionman Weeks stated that he was working on the south side of the track about a half mile west of Rochester when extra 6715 passed him at a speed of 25 or 30 miles an hour and saw a hot box on the south side and near the middle of the train and two men on top the train with a water can or dope bucket walking toward that car from the rear.

Section Foreman Coleman stated that he was working about 3 miles west of Hiles when extra 6715 passed him and he saw smoke from a hot box on the south side of a car about two-thirds the train length from the engine. He saw a trainman in the cupola of the caboose, gave him a hot box signal, which was acknowledged.

Car Inspector Robertson stated that he was in the pump house at New London, 5.5 miles west of Rochester, when extra 6715 passed there, saw that there was a hot journal box on a Pennsylvania hopper car and it was blazing two or three feet from the side of the truck. He saw a trainman in the cupola of the caboose and gave him a signal, but as the man was not looking toward him he did not believe the trainman saw the signal.

Operator Beardsley stated that when extra 6715 passed Rochester he noticed that on about the 20th car from the rear

there was a hot box. He saw two trainmen on that car, gave them a hot box signal, and they gave him a signal indicating that they knew of the hot box and were watching it.

Operator Reely stated that when extra 6715 passed Hiles, 5 miles west of Rochester, he noticed smoke from a hot box on about the 20th car from the rear of that train, gave a hot box signal to one of the trainmen who was riding in the caboose, and received a signal from him indicating that he knew that there was a hot box on the train.

Operator Ashwell stated that when extra 6715 arrived at Boyd, 12.4 miles west of Rochester, he saw a hot box on a coal car about the middle of the train and gave the conductor and rear brakeman a hot box signal, received a signal in reply and the brakeman began to look the train over to locate the hot box.

An examination of the truck on which the hot box was located disclosed that the journal had broken off about 9-3/4 inches from the end of the axle and about 2 inches from the inside collar of the journal, and at the time of the investigation that part of the journal which broke off had not been recovered, it probably being under the wreckage. The end of the axle, the inner end of the wedge and the top inner end of the oil box were all darkened and showed evidence of having been highly heated.

This accident was caused by a hot box which was allowed

to continue in the train until it finally resulted in a broken axle and the consequent derailment of the train.

The evidence indicates that the attention of Conductor Hartlieb was directed to the hot box on his train at a point nearly 14 miles west of the point of accident and at several intermediate points by employees along the right of way. It further appears that at a point about six miles west of the point of accident the journal box had gotten so hot that it was smoking and blazing. As both the conductor and rear brakeman were killed in the accident no reason can be given as to why they failed to stop the train for the purpose of setting the car out or allowing the journal to cool instead of permitting it to proceed a distance of 14 miles in that condition.

All the employees involved in this accident had good records and had been on duty about 13 hours at the time of the accident.