

March 5, 1912.

MEMORANDUM TO COMMISSIONER MACHORD:

Relative to accident on the Boston & Maine Railroad,  
October 9, 1911.

Draft submitted by the Chief Inspector of Safety Appliances  
as a basis for the report of the Commission.

On October 9, 1911, the Boston & Maine Railroad reported by telegraph a head-on collision occurring near Hampstead, N. H. No investigation of this accident was made at that time on account of not having inspectors available. On November 17, the Public Service Commission of New Hampshire began an investigation. At the request of the engineman held responsible this investigation was continued, and on December 18, the Public Service Commission requested that a representative of the Interstate Commerce Commission be present at the continuation of the investigation. Desiring to cooperate as far as possible with state commissions in the investigation of accidents, I arranged to be present at this hearing, and on December 22 joined the Public Service Commission at Concord, N. H., and assisted in completing the investigation. This investigation developed the following facts:

West-bound freight train No. 346, consisting of 18 loaded cars and a caboose, and hauled by engine No. 1492, left Deering Junction, Me., its eastern terminal, at 9:46 p. m. October 8, for Ayer, Mass. At 12:46 a. m., October 9, at Rochester, N. H., a station fifty miles west of Deering Junction, it received train order No. 6, requiring it to wait at Hampstead until 5 a. m. for east-bound freight train No. 307. On reaching Epping, N. H., a station twenty miles beyond Rochester, at 2:03 a. m., it received train order No. 13, stating that train No. 307 had rights over it from Nashua, N. H., to Windham, N. H., Windham being the second station west of Hampstead. Train No. 346 failed to observe train order No. 6 and passed Hampstead at 2:46 a. m., colliding with train No. 307 at a point about a mile east of Hampstead.

Train No. 307, consisting of nineteen cars and a caboose, and hauled by engine No. 1471, left Nashua, N. H., its western terminal, at 1:47 a. m., October 9, for Portland, Me. Prior to leaving Nashua this train received train orders Nos. 6 and 13 mentioned above. On its arrival at Windham at 3:33 a. m., having sufficient time on order No. 6 to make Hampstead, six miles distant, it proceeded to that station, colliding with train No. 346.

This accident caused the death of the engineman of train No. 307. Both engines were badly damaged, as well as about 20 cars.

This division of the Boston & Maine Railroad is a single track line, and at the point of the accident is straight, with a slight down grade to the west. The accident occurred about 300 or

400 feet west of a three-degree curve, which prevented the engine-men from discovering the danger until too late to materially reduce the speed of their trains, which was between thirty and forty miles per hour. Notwithstanding the fact that this is a very busy division, more than thirty-two trains daily passing over this single track line, there is no block signal system in use, trains being operated by train orders. Standard code rules are used, with a few variations.

Train order No. 6, which was made complete and delivered to train No. 346 at Rochester at 12:48 a. m., reads as follows:

"No. 346 wait at Sandown until 3:40 two forty a.m., for No. 307, at Hampstead until 3:00 three a.m., for No. 307, and at Windham until 3:25 three twenty-five a.m., for No. 309."

Train order No. 13, which was made complete and delivered to train No. 346 at Epping at 2:03 a.m., reads as follows:

"No. 305 meet No. 338 at Hampstead instead of Frequent and No. 346 at Sandown instead of Epping; No. 307 has right over Nos. 338 and 346 Nashua Union Station to Windham."

Under rule No. 220 of the Rules and Regulations of the Operating Department of the Boston & Maine Railroad, a train order once in effect continues so until fulfilled, superseded or annulled. Train order No. 6, requiring that train No. 346 should wait at Hampstead until 3:00 a. m., for train No. 307, not having been fulfilled, superseded or annulled, was in effect and train No. 346 should have been governed accordingly.

On receipt of train order No. 13 at Epping, the conductor handed the order to the head brakeman, who in turn delivered it to the engineer. Rule No. 210 requires that the engineer's copy of the order must be delivered to him personally by the conductor, and that the engineer must read his order aloud to the conductor before proceeding. This rule was not complied with by the conductor and engineer of train No. 346.

After leaving Epping a question was raised by the fireman as to the right of train No. 346 to pass Hampstead before 3:00 a.m., and in this discussion between the engineer, fireman and head brakeman, who was riding on the engine, it was decided by the engineer that order No. 13 annulled that part of order No. 6 pertaining to waiting at Hampstead until 3:00 a.m. The conductor, flagman and rear brakeman of train No. 346 also had a discussion as to their right to pass Hampstead before 3:00 a.m., but it was finally decided by the conductor that order No. 13 superseded order No. 6 and therefore the rights of train No. 346 were not restricted at Hampstead.

The engineer and conductor of train No. 307 complied fully with the rules of the company upon receipt of orders Nos. 6 and 13

at Nashua Union Station, had a full and complete understanding as to their rights, and proceeded past Windham with the understanding that order No. 6 was in effect, and that train No. 346 would wait for them at Hampstead until 3:00 a.m.

The Boston & Maine Railroad adopted standard rules June 21, 1909, and at the time of their adoption a general circular was issued calling attention to a number of important changes from the rules then in effect. Conductors and engineers promoted prior to this time were not examined as to the new rules, but all employees promoted since their adoption were required to pass a written examination. The conductor and engineer at fault had been in service twenty and eighteen years, respectively. They had not been examined on the standard code rules now in effect, neither have any of the employees on this division been examined unless promoted after the adoption of the same. To insure safety it is obvious that the officials of the Boston & Maine Railroad should see to it that employees have a full and complete knowledge of the rules under which they operate.

This accident was caused by the failure of the conductor and engineer in charge of train No. 346 to obey and be governed by train order No. 6, requiring them to wait at Hampstead for train No. 307 until 3:00 a. m.

Respectfully submitted,

Chief Inspector of  
Safety Appliances.